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ABSTRACT

The selected bibliography of research on speech handicapped children contains approximately 100 abstracts and associated indexing information drawn from the computer file of abstracts representing the Council for Exceptional Children Information Center's complete holdings as or November, 1973. Abstracts are chosen using the criteria of availability of document to user, current applicability, information value, author reputation, and classical content. Preliminary information explains how to read the abstract (a sample abstract is included for identification of abstracts parts), how to use the author and subject indexes, how to purchase documents through the Educational Resources Information Center Document Reproduction Service (three order blanks are provided), and how to order "Exceptional Child Education Abstracts" (an order blank is provided), in which the abstracts are originally published. Also, front information includes a list of terms searched to compile the bibliography and a list of journals from which articles are abstracted for the bibliography. Publication dates of documents abstracted range from 1960 through 1972. (MC)

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SPEECH HANDICAPPED–RESEARCH

A Selective Bibliography

November, 1973

CEC Information Center on Exceptional Children
An ERIC Clearinghouse
The Council for Exceptional Children
1920 Association Drive
Reston, Virginia 22091

Exceptional Child Bibliography Series No. 627

The work presented or reported herein was performed pursuant to a grant from the Bureau of Education for the Handicapped, US Office of Education, Department of Health, Education, and Welfare. However, the opinions expressed herein do not necessarily reflect the position or policy of the US Office of Education and no official endorsement by the US Office of Education should be inferred.

EC 060 700

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With a grant from the US Office of Education, the CEC Information Center was established at The Council for Exceptional Children to serve as a comprehensive source of information on research, instructional materials, programs, administration, teacher education, methods, curriculum, etc. for the field of special education. The Center functions as the Clearinghouse on Exceptional Children in the Educational Resources Information Centers (ERIC) program and also as a member center in the Special Education IMC/RMC Network. In addition, the CEC Center's program includes a commitment to a concentrated effort towards the development of products which will interpret research results into educational methods and practices.

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Each abstract contains three sections–bibliographic data, descriptors, and a summary of the document. The bibliographic section provides the document's identifying number (ED and/or EC), publication date, author, title, source, and availability. The descriptors indicate the subjects with which a document deals. The summary provides a comprehensive overview of the document's contents and in some cases document availability is announced here.

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Documents with an ED number and EDRS availability indicated may be purchased from the ERIC Document Reproduction Service (EDRS). For your convenience an order form is provided on the back cover of this bibliography.

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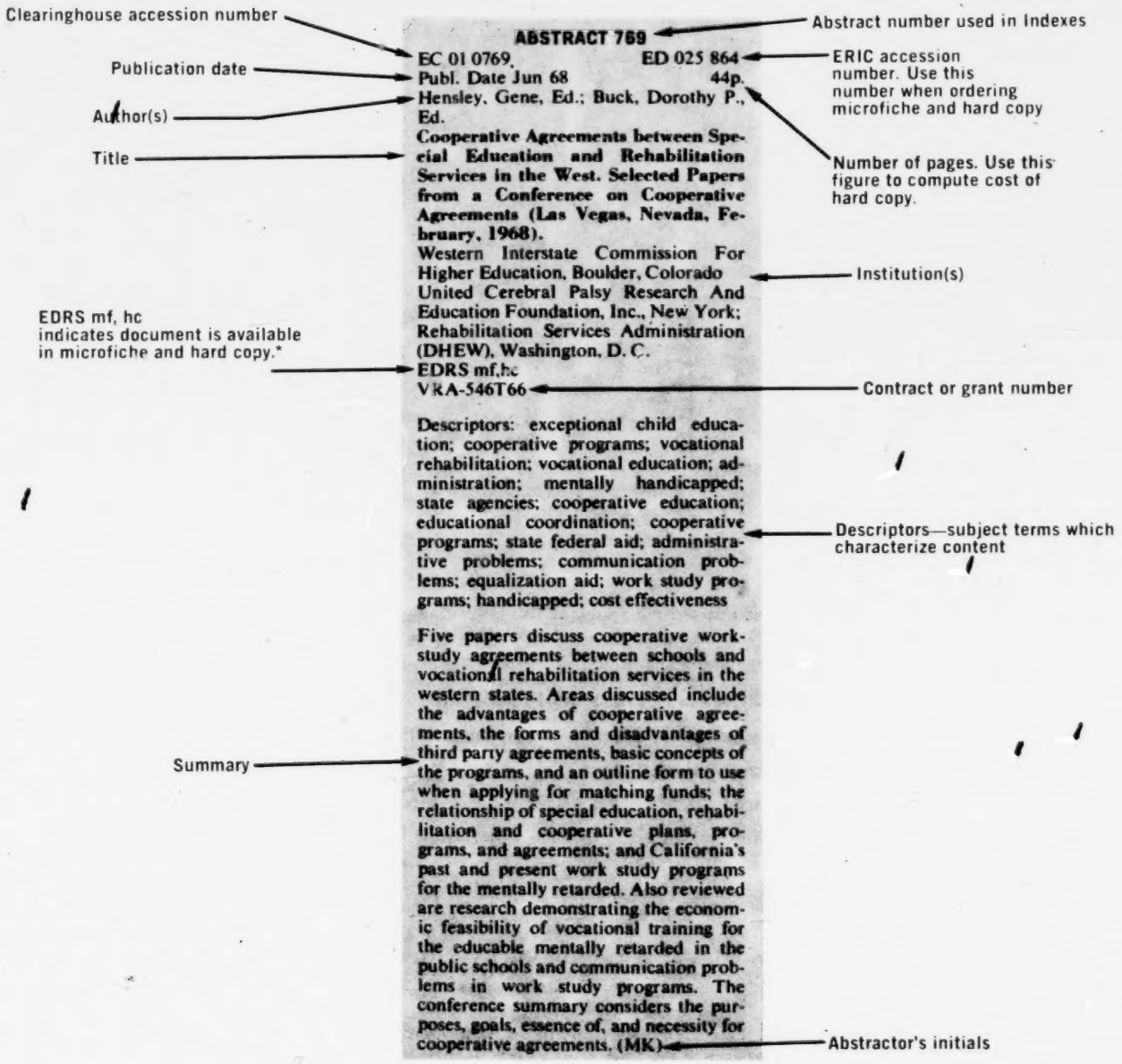
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ABSTRACT 769
EC 01 0769.
ED 025 864
ERIC accession number. Use this number when ordering microfiche and hard copy
Publication date
Publ. Date Jun 68
44p.
Author(s)
Hensley, Gene, Ed.; Buck, Dorothy P., Ed.
Title
Cooperative Agreements between Special Education and Rehabilitation Services in the West. Selected Papers from a Conference on Cooperative Agreements (Las Vegas, Nevada, February, 1968).
Number of pages. Use this figure to compute cost of hard copy.
Western Interstate Commission For Higher Education, Boulder, Colorado
Institution(s)
United Cerebral Palsy Research And Education Foundation, Inc., New York; Rehabilitation Services Administration (DHEW), Washington, D. C.
EDRS mf, hc
indicates document is available in microfiche and hard copy.*
EDRS mf,hc
VRA-546T66
Contract or grant number
Descriptors: exceptional child education; cooperative programs; vocational rehabilitation; vocational education; administration; mentally handicapped; state agencies; cooperative education; educational coordination; cooperative programs; state federal aid; administrative problems; communication problems; equalization aid; work study programs; handicapped; cost effectiveness
Descriptors—subject terms which characterize content
Five papers discuss cooperative work-study agreements between schools and vocational rehabilitation services in the western states. Areas discussed include the advantages of cooperative agreements, the forms and disadvantages of third party agreements, basic concepts of the programs, and an outline form to use when applying for matching funds; the relationship of special education, rehabilitation and cooperative plans, programs, and agreements; and California's past and present work study programs for the mentally retarded. Also reviewed are research demonstrating the economic feasibility of vocational training for the educable mentally retarded in the public schools and communication problems in work study programs. The conference summary considers the purposes, goals, essence of, and necessity for cooperative agreements. (MK)
Summary
Abstractor's initials

*NOTE: EDRS mf indicates microfiche reproduction only.

INDEXING TERMS SEARCHED

Indexing terms used to retrieve information on *Speech Handicapped-Research* form the Center's computer file of abstracts are listed alphabetically below:

Aphasia
Cleft Lip
Cleft Palate
Exceptional Child Research
Language Handicapped
Retarded Speech Development
Speech
Speech Clinics
Speech Education
Speech Evaluation
Speech Habits
Speech Handicaps
Speech Handicapped
Speech Improvement
Speech Instruction
Speech Pathology
Speech Tests
Speech Therapy
Stuttering

JOURNALS USED

Abstracts of articles from the following periodicals appear in this bibliography:

Bulletin of the Orton Society, 8415 Bellona Lane, Towson, Md. 21204

Elementary School Journal, University of Chicago Press, 5801 Ellis Avenue, Chicago, Ill. 60637

Exceptional Children, Council for Exceptional Children, 1920 Association Drive, Reston, Va. 22091

Journal of Learning Disabilities, 5 North Wabash Avenue, Chicago, Ill. 60602

Journal of Special Education, 3515 Woodhaven Road, Philadelphia, Pa. 19154

Journal of Speech and Hearing Disorders, American Speech and Hearing Association, 9030 Old Georgetown Road, Washington, D.C. 20014

Journal of Speech and Hearing Research, American Speech and Hearing Association, 9030 Old Georgetown Road, Washington, D.C. 20014

Speech Teacher, Speech Association of America, Statler-Hilton Hotel, New York, N.Y. 10001

The abstracts in this bibliography were selected from *Exceptional Child Education Abstracts,* Volumes I-V, No. 1.

ABSTRACTS

ABSTRACT 10022

EC 01 0022 ED 011 154
Publ. Date 66 26p.
MacLearie, Elizabeth G.; Gross, F. P.
Experimental Programs for Intensive Cycle Scheduling of Speech and Hearing Therapy Classes.
Ohio Dept. of Education, Columbus. Div. of Spec. Educ.
EDRS mf,hc

Descriptors: exceptional child research; speech handicapped; speech therapy; articulation (speech); experimental programs; speech handicaps; program development; speech improvement; program evaluation; program improvement; scheduling; Columbus

Surveys of professional literature indicated that intensive cycle scheduling for speech and hearing therapy might yield better results than more traditional methods. Experimental programs using this new method were established in five school systems as a field test of efficiency. The four years of research in intensive cycle scheduling in these five systems resulted in several revisions in program standards presented to the State Board of Education. Each of the five studies is reported briefly with the advantages summarized and suggestions made about the length and nature of the intensive cycle scheduling of speech and hearing therapy. (DF)

ABSTRACT 10246

EC 01 0246 ED 018 911
Publ. Date 67 19p.
Wepman, Joseph M.; McFarland, Robert L.
Treatment of Stammering through the Use of a New Electronic Device.
Chicago Univ., Ill., Speech and Lang. Res. Lab.
EDRS mf,hc

Descriptors: exceptional child research; speech handicapped; speech therapy; stuttering; electromechanical aids; language fluency; speech improvement; instructional aids; speech habits

To determine whether a small portable instrument could be used with speech therapy to reduce stammering severity, an electronic soundmaking device was developed. Individually fitted with molded earplugs, the device was similar to a hearing aid but produced a constant tone of sufficient volume to interrupt auditory feedback during speech and thereby to reduce the circularity of nonfluency. To test the device, subjects were selected from grade school, high school, and college. Half of the subjects received biweekly 1-hour speech therapy for 6 months with the use of the aid. The remaining served as controls and received no therapy. Each of the 24 subjects was pre- and posttested with (1) four subscales of the Wechsler Adult Intelligence Scale or the same subscales of the Wechsler Intelligence Scale for Children, whichever were age appropriate, (2) the Iowa Scale of Severity, and (3) the Gray Oral Reading Test (evaluated in terms of time in seconds taken to read the assigned paragraphs). Pretests indicated no statistically significant differences between the two groups on age, intelligence, or the Gray Test and Iowa Scale. Also, posttests indicated that the Gray Test was not significant between the two groups in pre- and post-training assessment. The ratings on the Iowa Scale, however, indicated significant improvement in the experimental group (beyond the .05 level) as compared to the control group. In addition, the therapist judged 10 of the experimental subjects as improved, and the subjects themselves considered the device helpful. Further research is urged, and a schematic drawing of the aid is included. A table presents data, and a bibliography lists 12 items. (GD)

ABSTRACT 10318

EC 01 0318 ED 012 539
Publ. Date 30 Jan 67 251p.
Rees, Mary Jane
An Evaluation of Speech and Hearing Problems in the Schools, Research Problems and Capabilities of a Research Center for Resolving Issues Pertaining to School Programs.
American Speech and Hearing Assn., Washington, D.C.
OEG-32-18-0000-1026
EDRS not available

Descriptors: exceptional child research; speech therapy; speech handicapped; speech and hearing programs; speech therapists; research and development centers; research problems; articulation (speech); speech handicaps; public schools; certification; speech tests; hearing tests; aurally handicapped; stuttering; professional training; research needs

Research is needed to determine the age at which a child with a functional articulatory disorder should begin therapy and the frequency of therapy. The authors rejected the survey method because of its many limitations. Research, using the experimental approach, was planned to screen 300,000 children, 724 of whom would be assigned to therapy, special attention, or untreated groups. Grade of beginning therapy and number of sessions would be varied. Results of the research would show whether therapy was more effective than vicarious learning and if so when and how therapy should be implemented. Noting that this experimental program was narrow in scope, the authors felt a new, more comprehensive approach was needed. Plans for the experimental program were set aside, and the authors developed a model for a research center for school speech therapists. Eight projects were undertaken to test the plan to determine if it could evolve information needed for determining standards for school speech and hearing programs. Projects involved school experience and preparation in test administration for student speech therapists, characteristics of pupils receiving speech and hearing therapy, assessment of oral communication skills, prospectus (for studies of stuttering, effects of therapy, remission of r errors, and remission of s errors), coordinated research, and teachers' ranking of children's participation in discussions. Functions of a research center are described. How such centers can encourage and aid the school speech therapist with research projects is shown. Included are a 100-item bibliography and a case record abstract form with instructions for use. (JD)

ABSTRACT 10469

EC 01 0469 ED 019 787
Publ. Date 66 53p.
Jensen, Paul J.
Effects of Reward and Punishment on Stuttering in Children.
Florida Univ., Gainesville, Communication Sciences Laboratory
OE-6-10-170
EDRS mf,hc

Descriptors: exceptional child research; speech handicapped; reinforcement; early childhood; negative reinforcement; positive reinforcement; speech handicaps; stuttering; verbal stimuli

The study was designed to determine whether or not there are significantly greater latency and response durations in children's speech as a result of verbal punishment compared to reward, and whether the effects are greater in younger or older children and in boys or girls. Subjects were 160 boys and girls from third and sixth grades. During a control period subjects repeated trisyllable nonsense words produced by a recorded voice. During the differential treatment period, subjects again repeated the nonsense words. Group A received positive verbal reinforcement, and Group B received negative verbal reinforcement. Dependent variables were latency duration (time from the end of an auditory stimulus to the beginning of subject's response) and response duration (time from beginning to end of a subject's response). Independent variables were period (control and effort), condition (reward and punishment), grade (3 and 6), and sex (female and male). Analysis of variance and covariance were used to evaluate the data and revealed evidence of heterogeneity of variance so that findings may not be assumed to be related only to treatment levels or means. Conclusions were (1) intrinsic characteristics existing among children need to be isolated for maximum understanding of disfluency, (2) the general tendency in the literature to interpret adult findings as applicable to children may be unwar-

ranted. (3) latency appears unrelated to reward and punishment for boys and girls in third and sixth grades. (4) third grade children have more disfluency (as measured by response duration) than sixth grade children in this situation, but not necessarily as a result of punishment. (5) generally, verbal punishment was associated with longer utterance than verbal reward, and (6) girls had shorter responses when rewarded and longer responses when punished as compared to males who showed no difference between conditions. A reference list cites 25 items. (MY)

ABSTRACT 10492

EC 01 0492 ED 013 013
Publ. Date 65 26p.
Garrett, Edgar Ray
Correction of Functional Misarticulation under an Automated Self-Correction System. Final Report.
New Mexico State Univ., University Park, Speech Dept.
EDRS mf,hc

Descriptors: exceptional child research; speech therapy; programed instruction; speech handicapped; articulation (speech); auditory training; teaching machines; early childhood; auditory discrimination; speech improvement; Templin Darley Articulation Test

The Automated Speech Correction Program (ASCP) was designed to test the use of programed instruction in the remediation of functional articulation errors. A series of programed tapes which take the student through auditory identification, auditory discrimination, production, and self-evaluation were designed. Sub-goals of the experiment were a comparison of correcting (representation of a stimulus when subject responded incorrectly) and non-correcting (subject notified of error by a tone) techniques and the effectiveness of personalized subject-therapist correction or no correction between the discrimination phase and the self-correction phase. Subjects were 100 elementary school children with functional misarticulations. Subjects were assigned to varied treatment and control groups. Results indicated (1) ASCP produced improved auditory discrimination and articulation patterns as measured by the Templin Short Test of Sound Discrimination and the Templin Darley Screening Test, (2) the group which received correction of error did not demonstrate a significant difference from those who received the non-correcting presentation, and (3) there is no difference among groups which received or did not receive individualized therapy between the discrimination and self-correction phases. (EB)

ABSTRACT 10502

EC 01 0502 ED 003 086
Publ. Date 65 93p.
Frick, James W.
Evaluation of Motor Planning Techniques for the Treatment of Stuttering.

Pennsylvania State University, University Park
Office of Education (DHEW), Washington, D. C., Bureau of Research
EDRS mf,hc
OEG-32-48-0720-5003 BR-5-0975

Descriptors: exceptional child research; speech handicapped; speech therapy; stuttering; speech handicaps; speech improvement; psychomotor skills; young adults; college students; males

Therapy procedures based on motor planning techniques were developed for the treatment of young adult stutterers. The subjects for this study were 24 male university students receiving therapy for stuttering. Using ratings of the severity of their overt stuttering, the investigators divided the subjects into an experimental group and a control group. Subjects in the experimental group were trained in the use of motor planning techniques in addition to receiving conventional therapy. Subjects in the control group received only conventional therapy. Tape recordings were made during periods of spontaneous speech by the subjects and while they read aloud at the beginning, middle, and end of the study. Subjects also completed the Stutterer's Self-Ratings of Reactions to Speech Situations at each of these three points in the study. At the end of the study, three doctoral candidates used a modified version of the Iowa Scale for Rating Severity of Stuttering to rate the severity of responses on the tape recordings. The ratings were compared with the scores obtained on the self-rating inventory. The study indicated that a group of subjects trained to use motor planning techniques in addition to receiving conventional therapy did show a greater reduction in the severity of their stuttering than a group of stutterers who received only conventional therapy. The motor planning techniques developed for use in this study can be used to help young adult stutterers form, construct, and evolve motor plans despite the presence of anticipation-anxiety. Although the techniques were felt to constitute a set of therapy procedures useful to professional workers, the conclusions should be regarded as tentative in view of the small sample of subjects and the lack of significant between-group differences. (WB)

ABSTRACT 10637

EC 01 0637 ED 024 197
Publ. Date Jan 68 357p.
Garrett, Edgar Ray
Speech and Language Therapy under an Automated Stimulus Control System.
New Mexico State University, Las Cruces
Office of Education (DHEW), Washington, D. C., Bureau of Education for the Handicapped
EDRS mf,hc
OEC-6-10-198
BR-5-0586

Descriptors: exceptional child research; programed instruction; mentally handicapped; speech therapy; learning disabilities; automation; schematic studies; aphasia; voice disorders; auditory discrimination; stimulus behavior; teaching machines; reinforcement; language handicapped; aural stimuli; articulation (speech); Templin Darley Articulation Test; Automated Stimulus Control System; ASCS

Programed instruction for speech and language therapy, based upon stimulus control programing and presented by a completely automated teaching machine, was evaluated with 32 mentally retarded children, 20 children with language disorders (childhood aphasia), six adult aphasics, and 60 normal elementary school children. Posttesting with the Templin-Darley Articulation Test showed that the Automated Stimulus Control System (ASCS) machine treatment produced non-significant results with mental significantly improved discrimination and articulation with those receiving pure tone only reinforcement (p less than .05). ASCS machine treatment produced significant changes with child aphasics (p less than .01). Following treatment, these subjects also showed improvement on the Peabody Picture Vocabulary Test, the Illinois Test of Psycholinguistic Abilities, and on word list performance. Both ASCS machine treatment and ASCS clinician-presented treatment produced significantly improved articulation with normal elementary school children (p less than .001). Adult aphasics showed no significant change, nor did retardates receiving traditonal therapy. Results indicated that significant changes in functional articulation programs occurred in 20% of the time usually required by traditional therapies. (Author/SN)

ABSTRACT 10638

EC 01 0638 ED 024 199
Publ. Date 04 Jul 68 71p.
Webster, Ronald L.
Effects of Stutterers' Self-Monitoring on Retention of Fluency Generated by Delayed Auditory Feedback. Final Report.
Hollins College, Virginia
Office of Education (DHEW), Washington, D. C., Bureau of Research
EDRS mf,hc
OEG-2-078290-3550
BR-7-8290

Descriptors: exceptional child research; speech handicapped; speech therapy; stuttering; speech handicaps; speech improvement; auditory discrimination; auditory training; aural stimuli; audiolingual methods; theories; language fluency; speech skills; feedback; Delayed Auditory Feedback

Several experiments that manipulate stuttering by the use of delayed auditory feedback (DAF) and the prolongation of speech are reported. In a study on six severe stutterers (aged 15 to 47), self monitoring as a source of reinforcement in the use of DAF reduced stuttering frequency. Stuttering frequency was investigated with six severe stutterers (aged 14 to 28) as a function of five different intervals of DAF. Results indicated that the continuous presentation of DAF significantly improved fluency (p less than .02), that there was little difference between the various levels of DAF and that there was no lasting effect. A

method for shaping fluent speech in stutterers was developed that modified the Goldiamond (1965) method by using the DAF without his special contingent relationships, that used no monitoring of reading rate, and added rate discrimination training to the fluency shaping program. Eight severe stutterers (aged 15 to 47) spent a total of 10 to 40 hours in the program, advanced at their own rate, and had blocking levels of zero by the time they reached the conversation part of the program; the effect had lasted 6 months at the time of this report. An auditory interference theory and a reexamination of the Sutton and Chase report are presented. (Author/SN)

ABSTRACT 10808

EC 01 0808 ED 024 200
Publ. Date Feb 68 47p.
Van Riper, Charles; Erickson, Robert
Cross-Validation of a Predictive Screening Test for Children with Articulatory Speech Defects. Final Report.
Western Michigan University, Kalamazoo
Office of Education (DHEW), Washington, D. C., Bureau of Research
EDRS mf,hc
OEG-3-7-068717-0198
BR-6-8717

Descriptors: exceptional child research; speech handicapped; tests; identification; speech therapy; test validity; elementary school students; grade 1; grade 2; grade 3; test results; student testing; speech tests; phonemes; screening tests; articulation (speech); Predictive Screening Test of Articulation; PSTA

To determine the accuracy with which the 47-item Predictive Screening Test of Articulation (PSTA) is able to identify first grade children who will master their articulation errors without speech therapy by the time they enter third grade, two groups of children were studied who were deficient enough in speech to be enrolled in therapy, but had no anatomic anomaly or were enrolled in special education classes. The basic cross-validation group had 144 children with an average of 6-6 years; the supplementary cross-validation group had 81 children with an average age of 6-7 years. The children were tested in the second month of school in 1965 (first grade), 1966 (second grade), and in 1967 (third grade), and had no therapy during this time. Results indicated that the predictive validity of the PSTA was demonstrated and that, for first grade populations similar to the basic cross-validation group, a cutoff score of 34 is optimally effective in differentiating children who will not require therapy from those who will. A 13-item bibliography, four tables, and the PSTA are included. A preliminary report is included in the ERIC system as ED 010 165. (SN)

ABSTRACT 11253

EC 01 1253 ED 026 797
Publ. Date Jan 68 39p.
Goldman, Ronald
Using the Initial Teaching Alphabet to Improve Articulation. Final Report.
Vanderbilt University, Nashville, Tennessee
Office of Education (DHEW), Washington, D. C., Bureau of Research
EDRS mf,hc
OEG-2-3252-0450-6011
BR-6-2417

Descriptors: exceptional child research; speech handicapped; speech therapy; auditory training; preschool children; research reviews (publications); visual discrimination; initial teaching alphabet; speech improvement; articulation (speech); auditory discrimination; visual stimuli; phonemics; instructional materials; parent participation; multisensory learning; auditory tests; phonetic analysis; phonetics

Twenty-four preschool children (aged 3-3 to 5-6) were studied to test the efficacy of newly developed phonemic-visual-oral materials in the correction of articulatory problems. All subjects were given an articulation test and a battery of five tests to measure auditory memory span and intelligence. Twelve children received 50 sessions of instruction, 1 hour long, using the new materials based on the Initial Teaching Alphabet and structured to cover auditory discrimination, sound sequencing, visual discrimination, phonemic synthesis and analysis, and rhyming. A control group of 12 was exposed to traditional articulation therapy procedure. The experimental group made significantly fewer errors in articulation after therapy than the control group based on the Goldman-Fristoe Filmstrip Articulation Test (p equals .05). No significant difference was found between groups in auditory memory skills and intelligence scores. Conclusions were that the experimental, visual-symbol approach has great potential in the modification of misarticulation. (RP)

ABSTRACT 11538

EC 01 1538 ED 029 440
Publ. Date Sep 68 126p.
Shames, George H. and Others
Effects of Listening Instructions and Severity of Cleft Palate Speech on Listeners. Final Report.
Pittsburgh University, Pennsylvania
Office of Education (DHEW), Washington, D. C., Bureau of Research
EDRS mf,hc
OEG-1-6-06-2115-1590
BR-6-2115

Descriptors: exceptional child research; speech handicapped; cleft palate; listening comprehension; verbal communication; verbal stimuli; speech skills; mothers; rating scales; test reliability; family relationship

Mothers of cleft and noncleft children (C- and non C-mothers) listened to a reading by a cleft palate child of a passage containing specified combinations of nasality and intelligibility. Groups were either uninstructed or instructed to listen to the content or the manner of speech; they assessed the nasality and intelligibility of the speaker and were given an information test on the material heard. Results were that mothers under content instructions scored higher on the content test than mothers under different instructions; however, non C-mothers scored significantly higher than C-mothers. The content score varied with the severity of the speech problem; the accuracy of rating nasality did not vary. C- and non C-mothers did not differ in accuracy of rating intelligibility and estimating the percentage of words in error, when both were under manner instructions; but C-mothers under manner instructions were more accurate on both intelligibility measures, than such mothers instructed to listen to content. (Author/JD)

ABSTRACT 11640

EC 01 1640 ED 002 886
Publ. Date 30 Jun 60 104p.
Siegenthaler, Bruce M.; Gerstman, Hubert L.
Motivation of Speech and Hearing Handicapped Children.
Pennsylvania State University, University Park
Office of Education (DHEW), Washington, D. C.
EDRS mf,hc
OEC-SAE-8173 CRP-495

Descriptors: exceptional child research; speech handicapped; aurally handicapped; speech therapy; motivation; auditory training

An analysis was made of child motivation in structured speech and hearing therapy based on the assumption that children who need this type of help have a conscious desire for improvement. Pertinent literature was surveyed to establish a listing of common motives, desires, and needs of people; and a motivational preference examination was developed. This was administered to over 400 children in two groups, those who were handicapped in hearing and speech and those who were normal. Each child was asked to rank several motivations (items) to measure his interest in improved speech and other basic motivational goals. Answers from each subject were then grouped according to sex, age, speech, and hearing categories; and the standard means and deviations between and within the groups were obtained. Not all the children sampled showed the desire for better speech and/or hearing high on their hierarchy of motives. However, the handicapped children generally ranked the hearing or speech motives very high with respect to their individual area of deficiency. Further study of motive patterns was recommended in order to build a workable relationship between the motives of the individual child and his need for special therapy. (JH)

ABSTRACT 12071

EC 01 2071 ED 010 165
Publ. Date 66 75p.
Van Riper, Charles
A Predictive Screening Test for Children with Articulatory Speech Defects.
Western Michigan University, Kalamazoo
Office of Education (DHEW), Washington, D. C.
EDRS mf,hc
CRP-1538 BR-5-0399

Descriptors: exceptional child research; speech handicapped; identification; speech tests; predictive measurement; test construction; speech improvement; articulation (speech); grade 1; rating scales; test validity; elementary school students; speech evaluation

A test to identify defective articulation in first grade children was constructed using the empirical scale derivation method to seek test items for the prediction of articulatory maturation. After selection and reduction to 135 items, an experimental item pool was administered to 167 beginning first-grade children who had been diagnosed as having functionally defective articulation. Requests were made that none of the subjects receive therapy during the study period. The subjects were classified in the beginning of the second grade as having still defective or normal articulation. This was done also at the third-grade level. Item analyses were performed to identify items which differentiated the groups. A response record sheet was individually scored with the keys derived empirically, the resultant frequency distributions of z-scores were analyzed, and possible cut-off scores were established. (RS)

ABSTRACT 20964

EC 02 0964 ED 033 504
Publ. Date Jun 69 71p.
Pendergast, Kathleen and Others
A Study of Protrusional Lisps to Identify Children Requiring Speech Therapy.
Seattle Public Schools, Washington
Office of Education (DHEW), Washington, D. C., Bureau of Research
EDRS mf,hc
OEC-5-10-180
BR-5-0319

Descriptors: exceptional child research; articulation (speech); prediction; speech improvement; speech skills; speech tests; performance factors; speech handicapped; kindergarten children; primary grades; performance factors; speech evaluation; speech therapy

To determine factors influencing the permanency of a protrusional lisp and to incorporate them into predictive profiles, approximately 8,000 kindergarten children were screened for articulation and those appearing to have a protrusional lisp were tested individually. The 1,043 subjects exhibiting such a lisp were examined semiannually for 4 years with a battery of speech and other tests; their school records were assessed; no speech therapy was given. The data for the 475 subjects who remained, based on recovery and nonrecovery by the end of grade 3, were formulated into seven profiles, one for each testing period. The pattern indicated that no single test or subtest proved to be predictive at all periods. Results demonstrated a consistent increase in the number of subjects recovering, with 56% recovering without therapy. Higher recovery rates were found among subjects with a protrusional lisp only or with less severe articulation problems initally and more rapid reduction of errors throughout. Also, subjects producing (t,d,n,), with the tongue tip and not the blade had a better chance to recover without therapy. (Author/JD)

ABSTRACT 21251

EC 02 1251 ED 003 056
Publ. Date 63 60p.
Wepman, Joseph M.
Speech Inaccuracy in Children as Related to Etiology.
Chicago University, Illinois
Office of Education (DHEW), Washington, D. C.
EDRS mf,hc
CRP-1198

Descriptors: exceptional child research; speech handicapped; mentally handicapped; child development; physically handicapped; articulation (speech); mental development; learning difficulties; educational experiments; verbal learning; learning processes; oral communications; etiology; cleft palate; speech tests; retarded speech development

The aim of this research project was to identify the articulatory inaccuracy profiles of children according to the etiology of the condition producing the speech difficulty. During the first phase of the research, a battery of tests to provide information on the articulatory patterns, verbal intelligence, and auditory perception of normal children was prepared and tested. The second phase of the research was devoted to a study of the articulatory errors of three experimental groups of children with speech problems stemming from developmental lags, from mental retardation, and from an operated cleft palate or congenitally short palate. The data collected from both phases of the study revealed that the articulatory profiles derived for children with different etiologies are each different from the other and readily identifiable as the profile characteristics of the etiology of the disorded. The group considered as suffering from developmental lags was found to have articulatory error profiles identical with the normal population and therefore should be considered as part of that group. (WB)

ABSTRACT 21278

EC 02 1278 ED 003 841
Publ. Date 64 32p.
Flowers, Arthur
Auditory-Visual Perceptual Shifting in Speech Handicapped Children.
State University of New York, Albany
Office of Education (DHEW), Washington, D. C.
EDRS mf,hc
CRP-S-095

Descriptors: exceptional child research; speech handicapped; perception; speech handicaps; perceptually handicapped; elementary school students; auditory perception; visual perception; visual stimuli; aural stimuli; student reaction; comparative analysis; stimulus devices

Interaction between vision and hearing was studied in 35 speech handicapped first grade children. The ability to shift attention from one sensory modality to another was labeled perceptual shifting. A device developed by experimental psychologists presented various stimuli to each subject and recorded the subject's reaction time. Stimuli consisted of a red light, a buzzer, or both light and buzzer. Students touched a panel to react and terminate the stimulus. Stimuli were presented in random order so that nine different stimulus-shift conditions were tested. Controls were 70 normally speaking first grade children selected from public schools. Results obtained demonstrated that the speech defective children studied were more handicapped on tasks of auditory-visual perceptual shifting when compared with their normal speaking peers. Without additional research, it was considered premature to use perceptual shift in the diagnosis of speech defects. (JM)

ABSTRACT 21487

EC 02 1487 ED 034 365
Publ. Date Jun 69 21p.
Mahaffey, Robert B.
Relationship of Selected Aspects of Hearing to Speech Disorders. Final Report.
University of Southern Mississippi, Hattiesburg
Office of Education (DHEW), Washington, D. C., Bureau of Education for the Handicapped
EDRS mf,hc
OEG-4-8-070055-0026-032
BR-7-D-055

Descriptors: exceptional child research; speech; audition (physiology); personality; time perspective; ears; auditory perception; sensory integration; feedback

To determine if a relationship exists between temporal patterns of hearing and temporal patterns of speech, and between personality and temporal patterns of speech and hearing, normally hearing subjects were measured on the following: critical fusion frequency, tone burst durations, fusion over silent intervals, interrupted speech, interrupted synthetic sentences, interrupted numbers, paired comparisons of tone burst durations, and the Eysenck Personality Inventory. Results indicated that the longer the phonation time and pause time of speech, the longer the integration time of hearing. It was suggested that the time involved in hearing affects the ease with which a person processes another's speech. Phonation time and pause time were thought to be related to the ability of the auditory system to bridge silent intervals. The left ear appeared to be more sensitive to speech timing than the right ear. Significant correlations existed between personality measures and timing measures of speech and hearing, but data did not indicate whether personality measures dictated the speech and hearing measures. (JM)

ABSTRACT 21493

EC 02 1493 ED 034 71
Publ. Date Aug 69 22p.
Love, Russel J.
Effects of Sensory Modality Stimulation on the Dysarthria of Cerebral Palsy.

Vanderbilt University, Nashville, Tennessee, Division Of Hearing and Speech Sciences
Office of Education (DHEW), Washington, D. C., Bureau of Education for the Handicapped
EDRS mf,hc
OEG-0-9-522043-2326(032)
BR-52-2043

Descriptors: exceptional child research; cerebral palsy; speech handicapped; speech therapy; speech improvement; aural stimuli; verbal stimuli; visual stimuli; speech tests; age differences; sex differences; articulation (speech); intelligence quotient; sensory; training

To explore the efficacy of improving the dysarthria of cerebral palsy under conditions of aural stimulation, visual stimulation, and combined aural-visual stimulation, 22 subjects (aged 7.6 to 19.0 years) received intensive stimulation for word imitation for 22 consecutive school days. The 87 words of the Irwin Integrated Articulation Test were randomized and presented over a series of nine stimulations of four new words each day. The results were that combined aural-visual stimulation produced fewer errors than aural stimulation alone; errors from visual stimulation alone could not be meaningfully calculated. Words under aural-visual stimulation were rated as significantly improved from the third to the twentieth day but were still considered below average on the scale. The difficulty of sound production did not differentiate conditions analyzed according to manner or articulation or place of articulation. Voicing improved under aural-visual stimulation, but negligible correlations were obtained with sex differences, age, and IQ. Indications were that brief periods of cumulative imitation under aural-visual stimulation can bring about better motor control for articulation in cerebral palsy. (Author/JM)

ABSTRACT 21677

EC 02 1677 ED 021 222
Publ. Date Feb 68 12p.
Reiff, Donald G.; Tikofsky, Ronald S.
Aphasia and Linguistic Competence.
Michigan University, Ann Arbor, Center for Research On Language and Language Behavior
Office of Education (DHEW), Washington, D. C., Bureau of Research
EDRS mf,hc
OEC-3-6-061784-0508
BR-6-1784

Descriptors: exceptional child research; aphasia; contrastive linguistics; English; grammar; language ability; language handicapped; sentence structure; competence

The theoretical notions of grammaticalness (in terms of sentences of a language) and competence (the user's knowledge of grammatical sentences of his language) are tested in one aspect: surface ordering of elements in putative English sentences. This paper reports the results of an initial contrastive experiment, with a sequence of studies to follow. An aphasic individual might be expected to perform differently from a normal individual when asked for judgments of normality in putative sentences in his native language. A group of normal subjects and a group of aphasic subjects were asked to: select the one which more closely approximates normal English from a pair of strings of randomly distributed English sentence formatives; rank a given string of randomly distributed formatives on a 1-to-5 scale as to its acceptability as normal English. Results show that both normal and aphasic subjects tend to prefer a given string, regardless of its order in the task, and that rank and preference are highly correlated. Where radical differences were expected, few if any were observed, raising the question of the empirical testability of linguistic competence, and of its involvement in the behavior of both normal and pathological language users. (Author/JD)

ABSTRACT 21768

EC 02 1768 ED 035 147
Publ. Date Aug 69 85p.
Harrison, Robert J.
A Demonstration Project of Speech Training for the Preschool Cleft Palate Child. Final Report.
Miami University, Coral Gables, Florida, School of Medicine
Office of Education (DHEW), Washington, D. C., Bureau of Education for the Handicapped
EDRS mf,hc
OEG-2-6-061101-1553
BR-6-1101

Descriptors: exceptional child research; speech handicapped; cleft palate; speech therapy; preschool programs; parent participation; language development; speech improvement; speech therapists; program evaluation; speech evaluation; articulation (speech); case studies (education)

To ascertain the efficacy of a program of language and speech stimulation for the preschool cleft palate child, a research and demonstration project was conducted using 137 subjects (ages 18 to 72 months) with defects involving the soft palate. Their language and speech skills were matched with those of a noncleft peer group revealing that the cleft group was significantly inferior in receptive and expressive language skills. The program consisted of stimulation in which the mother participated with the child for 1 hour each week; during the period the clinician worked directly with the child, counseled the mother and directed her participation, and observed the mother in language and speech stimulation. The results of the program indicated significantly better progress by those involved in the program, compared to a control group, in both language skills and speech skills. By the end of the program the children involved had skills commensurate with their chronological age. Appendixes and extensive tables of results are included. (JM

ABSTRACT 22293

EC 02 2293 ED 024 694
Publ. Date Jul 67 105p.
Wepman, Joseph M.; Morency, Anne S.
School Achievement as Related to Developmental Speech Inaccuracy. Final Report.
Chicago University, Illinois
Office of Education (DHEW), Washington, D. C., Bureau of Research
EDRS mf,hc
OEC-4-10-606
BR-5-0398

Descriptors: exceptional child research; speech handicapped; academic achievement; articulation (speech); auditory discrimination; enunciation improvement; grade 1; language research; reading achievement; speech skills; speech tests; speech therapy

A study, at the University of Chicago, of 177 unselected children (an entire first-grade class of normal intelligence, of common ethnic background, and within 6 months of their sixth birthday) was made to determine whether those children with speech inaccuracies consistent enough to qualify them for speech therapy would achieve in their school subjects as well as children having no speech inaccuracies; whether students receiving speech therapy (offered to half of the speech inaccuracy group) improved their school achievement or their articulation accuracy acquisition more than those not receiving therapy; and wheter a significant relationship existed between perceptual-modality factors and either school achievement or articulation. The study revealed no difference in school achievement between children who were considered to be in need of speech therapy and those who were not; no difference in school achievement whether a child had therapy or not; and no difference in improvement in articulation whether a child had speech therapy or not. A low but statistically significant relationship was found between the perceptual abilities and both articulation and school achievement. (Author/LH)

ABSTRACT 22438

EC 02 2438 ED 032 833
Publ. Date 67 68p.
Flowers, Arthur; Crandell, Edwin W.
Relations Among Central Auditory Abilities, Socio-Economic Factors, Speech Delay, Phonic Abilities and Reading Achievement: A Longitudinal Study.
Grand Blanc Community Schools, Michigan
Office of Education (DHEW), Washington, D. C., Bureau of Research
EDRS mf,hc
OEG-3-6-068313-1569
BR-6-8313

Descriptors: exceptional child research; speech handicapped; academic achievement; auditory evaluation; auditory perception; auditory tests; language handicapped; longitudinal studies; phonics; reading achievement; socioeconomic background

Three auditory perceptual processes (resistance to distortion, selective listening in the form of auditory dedifferentiation, and binaural synthesis) were evaluated by five assessment techniques: low pass

filtered speech, accelerated speech, competing messages, accelerated plus competing messages, and binaural synthesis. Subjects were 287 kindergarten students who were divided into speech-delayed and normal speaking subsamples. Twenty-five stimulus sentences for each of the five tests were taped under carefully controlled conditions and presented on a 1 to 1 basis in a sound-treated room. The children responded to spoken sentences by pointing to one of three pictures intended to represent the word which completed the sentences. A longitudinal analysis was made of the relationship between performance on these central auditory ability measures and first- and second-grade academic achievement, IQ, phonic ability, family socioeconomic status, and spontaneous speech improvement. The Gates Primary Reading Tests, the Stanford Achievement Test (Primary I and II), the Peabody Picture Vocabulary Test, and the Templin-Darley Screening and Diagnostic Tests of Articulation were among the testing measures used. All 132 correlation coefficients obtained for academic achievement were statistically significant. Many other significant correlations were found. Tables and references are included. (CM)

ABSTRACT 23338

EC 02 3338 ED N.A.
Publ. Date 70 7p.
Weber, Jack L.
Patterning of Deviant Articulation Behavior.
EDRS not available
Journal of Speech and Hearing Disorders; V35 N2 P135-41 May 1970
Paper Presented at the New York State Speech and Hearing Association Convention (May, 1969).

Descriptors: exceptional child research; speech handicapped; articulation (speech); linguistic patterns; phonologic units; phonetic transcription; auditory discrimination; speech therapy

The phonologic behavior of 18 subjects was studied to discover patterns of deviant articulation. The subjects all had normal oro-motor structures, normal hearing acuity, a record of at least 20 errors on the 50-item Templin-Darley Screening Test for Articulation, and were between the ages of 5 and 10. At least one deviant phonologic pattern, (defined as occurring when one or more relationships are discovered between phonemes that have at least one major articulation feature in common) was found for each subject, with most subjects exhibiting either two or three. No two subjects exhibited exactly the same patterns. Rather than the traditional approach to speech therapy, treatment was based on two principles: an entire pattern or articulation category was taught at once instead of one sound at a time, and the child was taught to consciously contrast the incorrect feature with the correct feature throughout all stages of therapy. (Author/GD)

ABSTRACT 23442

EC 02 3442 ED 041 412
Publ. Date Jan 70 88p.
Girardeau, Frederic L., Ed.; Spradlin, Joseph E., Ed.
A Functional Analysis Approach to Speech and Language. ASHA Monographs, Number 14.
American Speech and Hearing Association, Washington, D. C.
EDRS mf,hc
ASHA Monographs, American Speech and Hearing Association, 9030 Old Georgetown Road, Washington, D. C. 20014 ($4.00).

Descriptors: exceptional child research; speech handicapped; speech therapy; operant conditioning; aurally handicapped; reinforcement; television; articulation (speech); minimally brain injured; behavior change; speech pathology

Theory and laboratory research in operant behavior are applied to clinical practice in speech pathology. Introductory material summarizes the principles of operant conditioning as related to speech therapy. Clinical application is presented in the following areas: reinforcing properties of a television presented listener; reduction of reading and speaking rates; stimulus control of phoneme articulation; increase of functional speech by a brain-injured child; establishing and maintaining echoic speech by a nonverbal child; and deceleration of inappropriate vocal behavior by a hard of hearing child. A concluding chapter deals with implications of a functional approach to speech pathology and audiology. (JB)

ABSTRACT 23575

EC 02 3575 ED 042 308
Publ. Date May 70 97p.
Bell, Dorothy Mays; Sanders, Edwina
An Investigation of an Individualized Approach to Evaluating, Grouping, and Planning Therapy for Children with Functional Articulation Problems in the First and Second Grades in a Public School System. Final Report.
Texas Christian University, Fort Worth; Fort Worth Independent School District, Texas
Office of Education (DHEW), Washington, D. C., Bureau of Research
EDRS mf,hc
OEG-7-9-530035-0093(010)
BR-9-G-035

Descriptors: exceptional child research; speech handicapped; articulation (speech); speech therapy; grouping (instructional purposes); auditory perception; elementary school students

A study was conducted to investigate methods of grouping children in grades 1 and 2 in a speech and hearing therapy program, and to determine the prevalence of certain auditory skills and deviant swallowing behavior associated with articulation problems. A screening test of articulation identified 255 control and 255 experimental subjects. A test battery was administered, on the basis of which six therapy groups were formed. Statistical analysis of data collected from a later administration of tests showed the grouping of children with articulation problems, and the use of pre-professionals (graduate students in speech and hearing pathology) to be effective procedures. Five of the groups achieved mean gain of articulation scores greater than that of the control groups. Of the 12 variables studied, nine achieved significant gain by the experimental samples in any group. Association of auditory deviations with articulation problems was confirmed, but deviant swallowing behavior was not a factor. (KW)

ABSTRACT 23613

EC 02 3613 ED N.A.
Publ. Date Aug 70 5p.
Marshall, Robert C.
The Effects of Reponse Contingent Punishment upon a Defective Articulation Response.
EDRS not available
Journal of Speech and Hearing Disorders; V35 N3 P236-40 Aug 1970

Descriptors: exceptional child research; speech handicapped; articulation (speech); speech therapy; conditioned stimulus; negative reinforcement

The effective use of a response contingent punishing stimulus (electric shock) in the amelioration of an incorrect articulation response is described. The patient was a 20-year-old white male who complained that his /s/ and /z/ interdental lisp problem kept him from attending a special school. Following several ear training sessions, finger electrodes from a Grason-Stadler Psychogalronometer were attached to the third and fourth fingers of the patient's left hand. The shock was introduced during the second period of each session. The first and third parts of the session the clinician merly counted the errors. After eight sessions the error rate was so low therapy was discontinued. Follow-up visits showed the patient maintained a low error rate. The clinician used shock because rapid correction of the lisp was important to the patient for vocational advancement, the speech disturbance was simple, and the patient understood the reasons for the shock. For certain clients, with certain conditions, response contingent punishment can be useful. (GD)

ABSTRACT 30032

EC 03 0032 ED 043 158
Publ. Date Jun 70 7p.
McLean, James E.
Stimulus Shift: A Demonstration Motion Picture. Final Report.
Kansas University, Lawrence, Bureau of Child Research
Office of Education (DHEW), Washington, D. C., Bureau of Education for the Handicapped
EDRS mf,hc
OEG-0-9-262019-2325(032)
BR-26-2019

Descriptors: exceptional child research; speech handicapped; articulation (speech); speech therapy; audiovisual aids; professional education; instructional films; film production

The purposes of the project described were to demonstrate the use of innovative stimulus shift techniques in articulation and language training, and to experi-

ment with use of motion picture photography in the education and instruction of clinicians and therapists working with speech handicapped children. A 37-minute sound color film was produced showing clinical procedures as applied to two subjects involved in articulation speech therapy. The procedures demonstrated were developed for mentally handicapped children, but are appropriate for all clinical subjects. (KW)

ABSTRACT 30104

EC 03 0104 ED 043 178
Publ. Date Sep 69 132p.
Gregory, Hugo H.
An Assessment of the Results of Stuttering Therapy.
Northwestern University, Evanston, Illinois
Social and Rehabilitation Service (DHEW), Washington, D. C., Research and Demonstration Grants
EDRS mf,hc

Descriptors: exceptional child research; stuttering; speech therapy; speech handicapped; adults; speech evaluation; anxiety; progressive relaxation; psychological patterns

To investigate the effects of stuttering therapy involving the avoidance reduction-anxiety reduction approach, a study was conducted with 16 adult stutterers who received group and individual therapy for two evenings a week for nine months. Evaluations were made nine months prior to therapy, at the beginning and end of therapy, and nine months after the close of the treatment. Results indicated that the more severe stutterers showed improvement during therapy but regressed slightly during the followup period, while those subjects with a less severe handicap maintained their improvement during the followup period. Since the progress of the subjects was not statistically significant, it was concluded that modifications of the therapy program were necessary for more effective and lasting results. The various testing devices revealed certain changes in areas of personality and attitudes, but showed no change in speech associated anxiety. (RD)

ABSTRACT 30404

EC 03 0404 ED N.A.
Publ. Date Sep 70 17p.
Williams, Frederick
Psychological Correlates of Speech Characteristics: On Sounding Disadvantaged.
EDRS not available
Journal of Speech and Hearing Research; V13 N3 P472-88 Sep 1970

Descriptors: exceptional child research; speech handicapped; teacher attitudes; disadvantaged youth; Negro dialects; racial discrimination; language patterns; evaluation criteria; social status

Grade school teachers tended to differentiate the speech samples of children along two gross and relatively independent dimensions tentatively labeled confidence-eagerness and ethnicity-nonstandardness. Specific ratings of a child's social status could be interpreted relative to this two-dimensional judgmental model. Moreover, based on measured characteristics of the speech samples, it was possible to develop interpretable prediction equations for variations in the social status ratings. Judgments of social status coincided with an earlier assigned socioeconomic index far more so for Negro than for white children. This prevailed generally with white and Negro teachers, sex of child, and the child's speech topic. Although judgmental dimensions and prediction equations were roughly similar for Negro and white teachers, differences pointed to more dependence between ratings of race and status on the part of white teachers. When rating a child as high status, the white teachers had a greater tendency to identify him as being white, even if the child himself were Negro. (Author)

ABSTRACT 30411

EC 03 0411 ED N.A.
Publ. Date Sep 70 28p.
Johns, Donnell F.; Darley, Frederic L.
Phonemic Variability in Apraxia of Speech.
EDRS not available
Journal of Speech and Hearing Research; V13 N3 P556-83 Sep 1970

Descriptors: exceptional child research; speech handicapped; aphasia; articulation (speech); adults; evaluation; measurement techniques; listening comprehension; phonemes

Articulatory performance in the condition apraxia of speech (variously designated aphemia, Broca's aphasia, motor aphasia, and cortical dysarthria) was analyzed in ten patients and compared with the performance of ten dysarthric and ten normal subjects. Testing ruled out perceptual impairment and muscular weakness or incoordination as the cause of articulatory errors of the apraxic group. Initial consonant production in speech apraxia is characterized by a high degree of inconsistency of articulation errors; predominance of substitution, repetition, and addition errors as opposed to distortion errors of dysarthria; marked prosodic disturbance without phonatory and resonatory changes; increase of difficulty from spontaneous to oral reading to imitative speech conditions; facilitation of correct articulation by visual monitoring in the auditory-visual stimulus mode in contrast to the auditory (repeating tape-recorded stimuli) or visual (reading words) modes; deterioration of articulation with increase in length of word; and improvement when the patient is allowed to make several consecutive attempts to produce a desired response. Such aberrations in programing of articulatory movements in volitional speech in the absence of significant impairment of language comprehension and muscular weakness fit well within the generic term apraxia. They warrant a therapeutic approach distinct from approaches effective in aphasia and dysarthria. (Author)

ABSTRACT 30413

EC 03 0413 ED N.A.
Publ. Date Sep 70 12p.
Some Dimensions of Auditory Language Comprehension in Aphasia.
EDRS not available
Journal of Speech and Hearing Research; V13 N3 P595-606 Sep 1970

Descriptors: exceptional child research; speech handicapped; aphasia; auditory perception; listening comprehension; vocabulary skills; syntax; grammar

Four aspects of auditory comprehension were compared in 44 normal children ages 4 to 9, in 12 normal adults, and in 52 aphasics of five diagnostic classes: Broca's, Wernicke's, conduction, anomic, and global asphasics. The four aspects studied were breadth of vocabulary, auditory sequential pointing-span, comprehension of directional prepositions, and recognition of correct grammatical usage of prepositions. The aphasics' patterns of success were all different from those of the children, and the diagnostic subgoups could be distinguished from each other by a discriminant analysis. The mean pointing-span of the best aphasic group (anomics) was below the level of 6-year-olds. Broca's aphasics had by far the poorest score. It is concluded that auditory comprehension is multidimensional, and that its pattern of disturbance is characteristic for different aphasic subgroups. (Author)

ABSTRACT 30414

EC 03 0414 ED N.A.
Publ. Date Sep 70 17p.
Sarno, Martha Taylor and Others
Speech Therapy and Language Recovery in Severe Aphasia.
EDRS not available
Journal of Speech and Hearing Research; V13 N3 P607-23 Sep 1970

Descriptors: exceptional child research; speech handicapped; aphasia; speech therapy; adults; programed instruction; language tests; language skills; audiovisual materials

This study was designed to investigate whether speech therapy enhances language recovery in severe aphasia and whether or not the method of speech therapy used affects recovery if it occurs. Thirty-one post CVA, severe expressive-receptive aphasics were assigned to one of three groups: programed instruction, nonprogramed instruction, and no treatment. All groups were comparable with respect to age, duration of symptoms, sex distribution, and education. Patients were initially tested to establish their level of functional language skills and ability to perform the terminal behaviors to be taught. Patients in the treatment groups received up to 40 hours of therapy. Posttests were administered individually after each terminal behavior was taught. All posttests were readministered at the termination of treatment and again one month after termination to determine the degree to which a behavior had been retained. There were no significant differences in outcome under the three treatment conditions. Results strongly suggest that current speech therapy does not modify verbal behavior in

this population. A more realistic approach to the overall rehabilitation management of the severe aphasic, and more careful selection of patients who will receive speech therapy is suggested. (Author)

ABSTRACT 30416

EC 03 0416 ED N.A.
Publ. Date Sep 70 10p.
Pleasonton, Anna K.
Sensitivity of the Tongue to Electrical Stimulation.
EDRS not available
Journal of Speech and Hearing Research, V13 N3 P635-44 Sep 1970

Descriptors: exceptional child research; speech handicapped; sensory experience; electronic equipment; articulation (speech); tactual perception

This paper describes a technique for the evaluation of lingual sensitivity. Surface electrodes were used to administer short electrical pulses to the tip, midline dorsum, and lateral margins of the tongue of five normal adolescents. The tongue tip was more sensitive than the dorsum, in an approximate 2:1 ratio. Differences in sensitivity among the areas of the dorsum are of smaller magnitude and not consistent from one day to the next. Neither the right nor the left side, nor the sides corresponding to the dominant and the nondominant hand showed consistent evidences of greater sensitivity. (Author)

ABSTRACT 30418

EC 03 0418 ED N.A.
Publ. Date Sep 70 10p.
Morrison, Eleanor B. and Others
Parkinson's Disease: Speech Disorder and Released Infantile Oroneuromotor Activity.
EDRS not available
Journal of Speech and Hearing Research; V13 N3 P655-66 Sep 1970

Descriptors: exceptional child research; speech handicapped; neurologically handicapped; psychomotor skills; speech tests; infant behavior; behavior patterns; Parkinson's Disease

Thirty subjects with primary Parkinson's disease, each of whom was classified as being in one of three stages of disease progression, were examined for the presence of infantile oroneuromotor activity and evaluated for severity of speech disorder. It was expected that greater speech defectiveness and an increased incidence and strength of infantile oroneuromotor symptoms would accompany each stage of disease progression. Although severity of speech disorder and presence of infantile oroneuromotor symptomatology did not parallel the various stages of disease progression, the results of this study indicate that in the most severe stage of parkinsonian progression, subjects were more severely impaired in speech ability, and more subjects evidenced infantile oroneuromotor symptomatology. Since infantile oral reflexology was tested independently of speech, it is not known if these patterns become released during the act of speaking; it could not be determined whether any released activity occurred intraorally, and observation of each of the subjects during the act of speaking did not reveal infantile oroneuromotor patterns akin to those which have been reported in the literature in relation to cerebral palsied individuals. (Author)

ABSTRACT 30585

EC 03 0585 ED 042 366
Publ. Date Jun 70 95p.
Boone, Daniel R.; Stech, Ernest L.
The Development of Clinical Skills in Speech Pathology by Audiotape and Videotape Self-Confrontation. Final Report.
Denver University, Colorado, Speech and Hearing Center
Office of Education (DHEW), Washington, D. C., Bureau of Education for the Handicapped
EDRS mf,hc
OEG-9-071318-2814
BR-1381

Descriptors: exceptional child research; speech handicapped; aurally handicapped; speech therapists; professional education; audiovisual instruction; video tape recordings; phonotape recordings; speech therapy

Twenty student speech and hearing clinicians were studied on the relative effectiveness of using audiotape and videotape confrontation group, and ten to the videotape group. Each listened to segments of their taped therapy sessions, scoring them as they listened. Changes were found among all subjects in their knowledge of and attitude toward behavioral concepts which were tested before and after the experiment. No significant changes in amount of positive reinforcement given over the 8 weeks were noticed, but more negative reinforcers (punishment) were used. Results showed both modes of self-confrontation were effective in changing the verbal behaviors of student clinicians, and both lent themselves well to training clinicians. (Author/KW)

ABSTRACT 30857

EC 03 0857 ED N.A.
Publ. Date Dec 70 2p.
Martin, Richard; Berndt, Lois A.
The Effects of Time-Out on Stuttering in a 12 Year Old Boy.
EDRS not available
Exceptional Children; V37 N4 P303-4 Dec 1970

Descriptors: exceptional child research; speech handicapped; behavior change; stuttering; negative reinforcement; reinforcement

After a baserate session during which an experimenter tallied stuttering frequencies, a chime and red light were used each time the subject stuttered. He was instructed to stop reading until the light went off. The introduction of the time-out reduced stuttering frequency from around 28 per 2 minutes to virtually zero. A slight increase was noted after cessation of the time-out. Additional research in this area is recommended. (RJ)

ABSTRACT 31054

EC 03 1054 ED N.A.
Publ. Date Feb 69 5p.
Gallagher, Betty
Teachers' Attitudes and the Acceptability of Children with Speech Defects.
EDRS not available
Elementary School Journal; V69 N5 P277-81 Feb 1969

Descriptors: exceptional child research; speech handicapped; peer acceptance; teacher attitudes; negative attitudes

The investigation studied the effect of teacher's attitudes on children's responses to the defective articulation of a child their own age. Answers were sought to two questions: Do the verbal expressions of a teacher's attitude affect children's reactions to a speech handicapped peer? If so, do their reactions to the child as a friend differ from their reactions to his speech? Subjects were 640 first-grade students. Teacher statements were developed reflecting favorable, unfavorable, neutral, and no attitudes. Recordings were made of two speech handicapped boys telling stories. After an attitude-story (1 minute segment) combination was presented, each subject was asked whether he would like to listen to this boy tell a story, sit next to him in school, play with him after school, and whether the subject liked the way the boy talked. Results showed the subjects accepted the speech defective boy most readily when no attitude was expressed, less readily when the favorable attitude was expressed, less when the attitude was neutral, and least when it was unfavorable. Responses also showed the boy was more acceptable in play than in work situations, and more acceptable as a friend out of school than as a working associate in school. (KW)

ABSTRACT 31177

EC 03 1177 ED N.A.
Publ. Date Dec 70 6p.
Needham, Ellen C.; Black, John W.
The Relative Ability of Aphasic Persons to Judge the Duration and Intensity of Pure Tones.
EDRS not available
Journal of Speech and Hearing Research; V13 N4 P725-30 Dec 1970

Descriptors: exceptional child research; aphasia; auditory perception; speech handicapped; language handicapped; aural stimuli; time perspective; sensory integration

The investigation was undertaken to determine the relative ability of aphasic individuals to perform specific sensory discrimination tasks. The study sought to determine if aphasics differ from nonaphasics in their abilities to judge aural tasks involving temporal discrimination and intensity discrimination. The two groups of adult experimental subjects listened to two series of pairs of pure tones. The first series of 20 pairs was judged on the basis of temporal variations and the second series on the basis of variations in the relative intensity. Three statistical methods were used to analyze the data. First, the total number of times each subject judged the variable

member of each pair to be longer (or louder) was determined. These values were then plotted on two graphs using the Method of Least Squares to obtain linear functions. Additionally, the difference limen and the t-test for independent means were applied to the data. All three statistical methods revealed that aphasics performed less accurately than did nonaphasics on sensory discrimination tasks. (Author)

ABSTRACT 31179

EC 03 1179 ED N.A.
Publ. Date Dec 70 14p.
Van Demark, D. R.
A Comparison of the Results of Pressure Articulation Testing in Various Contexts for Subjects with Cleft Palates.
EDRS not available
Journal of Speech and Hearing Research; V13 N4 P741-54 Dec 1970

Descriptors: exceptional child research; cleft palate; speech evaluation; speech handicapped; articulation (speech)

Twenty-five subjects with cleft palate in each of three manometer ratio groups were administered three pressure articulation tests of varying complexity. These included a word articulation test, the reading of a sentence articulation test, and a repeated sentence articulation test. A sample of connected speech was also obtained to compare judged ratings of articulation defectiveness with scores obtained on the three articulation tests. All tests demonstrated a strong relationship to judged severity. Significant differences in performance were evident among manometer ratio groups and on articulation tests. Subjects achieved the highest percent correct articulation on the word articulation test followed by the repeated sentence articulation test and the sentence articulation. With one exception, subjects with high manometer ratios achieved the highest scores, followed by the marginal and then by poor closure groups. To explore further difference in performance among the manometer ratio groups and articulation tests, errors on manner of production category and type of errors were examined. Subjects in the high manometer ratio group produced significantly fewer errors on fricatives; whereas, nasal distortions increased as manometer ratio decreased.

ABSTRACT 31180

EC 03 1180 ED N.A.
Publ. Date Dec 70 13p.
Speaks, Charles and Others
Comparison of Sentence Identification and Conventional Speech Discrimination Scores.
EDRS not available
Journal of Speech and Hearing Research; V13 N4 P755-67 Dec 1970

Descriptors: exceptional child research; aurally handicapped; speech evaluation; audiometry; auditory perception

Performance scores for PB (monosyllabic) word lists and for synthetic sentences were compared on sixty hearing-impaired patients. Scores on the two types of test materials showed a direction to audiometric contour. Patients with relatively flat losses performed similarly with words and with sentences. As the slope of the audiometric pattern increased, however, the discrepancy between the scores for words and sentences also increased. Results were consistent with previous findings on the frequency regions important for understanding the two types of test material. (Author)

ABSTRACT 31198

EC 03 1198 ED N.A.
Publ. Date Nov 70 25p.
Compton, Arthur J.
Generative Studies of Children's Phonological Disorders.
EDRS not available
Journal of Speech and Hearing Disorders; V35 N4 P315-39 Nov 1970
Presented in Part at the National Convention of the American Speech and Hearing Association (44th, Denver, November, 1968).

Descriptors: exceptional child research; speech handicapped; articulation (speech); phonemes; speech therapy; phonology; phonetics; speech evaluation; speech habits

The purpose of the study was to illustrate that the defective sounds of speech characterizing an articulatory disorder are part of a coherent and productive system organized by means of phonological principles, and failure to recognize these organizing principles leads to hit and miss therapy which may be ineffectual and may even cause new misarticulations. Phonological analyses of two children, ages 6 and 4 1/2 years, with 70-80% unintelligible speech are presented, which demonstrate their errors to be systematic against their own grammars, and which show that their misarticulations stem from a relatively small number of underlying phonological principles producing a larger number of actual deviant phonetic forms. These principles, defined in the study, are hypothesized to make up most of children's articulatory disorders. Therapy methods are discussed, and an experimental test confirming the validity and applicability of such grammatical formulations is reported. (Author/GD)

ABSTRACT 31201

EC 03 1201 ED N.A.
Publ. Date Nov 70 7p.
Jacobs, Rhoda J. and Others
A Stimulability Test for Cleft-Palate Children.
EDRS not available
Journal of Speech and Hearing Disorders; V35 N4 P354-60 Nov 1970

Descriptors: exceptional child research; speech handicapped; articulation (speech); cleft palate; speech therapy; imitation; consonants

The Miami Imitative Ability Test (MIAT) was developed to evaluate the ability of the cleft-palate speaker to imitate the articulatory placement and acoustic production of consonant sounds in CV productions. The MIAT was given to 129 children with and 154 children without cleft palate who were between the ages of 30 and 72 months, along with an articulation test of sounds in word productions. This test was given again after 12 months to 41 of the cleft palate children; 24 had received language and speech stimulation and 17 received none. Some results of comparisons showed that for all children on the MIAT the imitation of the articulatory placement was better than the imitation of the acoustic production of consonant sounds. Cleft palate children were significantly inferior in ability to imitate both sound placement and production. The MIAT has potential for use as a diagnostic measure of velopharyngeal adequacy and as a screening test in evaluating articulation skills. The MIAT is included in the appendix. (GD)

ABSTRACT 31202

EC 03 1202 ED N.A.
Publ. Date Nov 70 3p.
Silverman, Franklin H.
Concern of Elementary-School Stutterers about Their Stuttering.
EDRS not available
Journal of Speech and Hearing Disorders; V35 N4 P361-3 Nov 1970

Descriptors: exceptional child research; speech handicapped; stuttering; speech skills; self evaluation; self concept

The purpose of the study was to provide some data on the level of concern of elementary school stutterers about their stuttering. Participants were 62 second through fifth-grade children who were being seen by speech clinicians for stuttering therapy. Stuttering severity ranged from mild to severe. A speech sample was recorded from each child consisting of oral reading and spontaneous speech. The experimenter then asked each child to tell him three wishes. Of the 62 children, only four (all males) made wishes mentioning stuttering. The data suggests that elementary school stutterers as a group, especially those below the fourth grade level, are not highly concerned about their stuttering. The approach used in this study may be useful clinically for establishing a child's level of concern about his stuttering. (GD)

ABSTRACT 31205

EC 03 1205 ED N.A.
Publ. Date Nov 70 14p.
Holland, Audrey L.
Case Studies in Aphasia Rehabilitation Using Programed Instruction.
EDRS not available
Journal of Speech and Hearing Disorders; V35 N4 P377-90 Nov 1970

Descriptors: exceptional child research; speech handicapped; aphasia; programed instruction; case studies; speech therapy; group therapy; programed materials

The advantages and limitations of applying programed procedures in a clinic to help aphasic clients are discussed. The background for this work is summarized, a series of seven selected case records and one semiprogramed group experience are reviewed, and some general considerations regarding programed in-

struction for aphasics are discussed. The cause of the aphasia and the program used for each case is described. The summary of programed approaches for individual patients is presented in table form including the activity, stimulus mode, and response form. Problems associated with programed instruction are discussed including the nature of the teaching material and how to use the materials for aphasics. It is emphasized that it is probably more practical for the clinician to devote his time to experimental development of his own programed materials, than to use materials developed by another clinician. (GD)

ABSTRACT 31235

EC 03 1235 ED N.A.
Publ. Date 68 311p.
Rosenberg, Sheldon, Ed.; Koplin, James H., Ed.
Developments in Applied Psycholinguistics Research.
EDRS not available
Macmillan Company, 866 Third Avenue, New York, New York 10022 ($8.95).

Descriptors: exceptional child research; psycholinguistics; language handicaps; language research; second language learning; aurally handicapped; aphasia; mentally handicapped; schizophrenia; conference reports

The text contains seven articles based on presentations from a summer institute in applied psycholinguistics sponsored by the department of psychology of the George Peabody College for Teachers. The topics discussed in the papers include the objectives and current status of applied psycholinguistics, the development of syntactic control in children, research on second-language learning, and language learning in relation to the deaf. Also described are studies on the grammar of aphasics, a disattention interpretation of schizophrenic language, and environmental factors in the language development of mentally handicapped children. A general overview of the collection is provided by Sheldon Rosenberg. (RD)

ABSTRACT 31967

EC 03 1967 ED N.A.
Publ. Date Apr 71 5p.
Holloway, Gordon F.
Auditory-Visual Integration in Language-Delayed Children.
EDRS not available
Journal of Learning Disabilities; V4 N4 P204-8 Apr 1971

Descriptors: exceptional child research; learning disabilities; retarded speech development; visual perception; auditory perception; perceptual motor coordination; perception; psycholinguistics

Twelve language-delayed children with non-specific etiologies were matched with children having normal language development for age, sex, and IQ. Measurement of auditory-visual integrative ability, visual-motor integrative ability, and perception of distorted speech revealed the two groups to be significantly different in the auditory-visual component and perception of distorted speech, but not in visual-motor integrative ability. (Author)

ABSTRACT 32275

EC 03 2275 ED N.A.
Publ. Date May 71 6p.
Goldman, Ronald; Dixon, Sarah D.
The Relationship of Vocal-Phonic and Articulatory Abilities.
EDRS not available
Journal of Learning Disabilities; V4 N5 P251-6 May 1971

Descriptors: exceptional child research; speech handicapped; articulation (speech); phonetics; speech skills

To clarify the importance of certain vocal-phonic skills in the development of speech and language, the study was designed to determine whether preschool articulatory defective children differ from normal speaking children in one language skill--their ability to synthesize phonemic components into whole words. An experimental group of 17 preschool articulatory defective children were employed as subjects. Three different tests of phonemic synthesis provided the basis for these comparisons: The Roswell-Chall Auditory Blending Test, The Auditory Test 2 from the Marion Monroe Reading Aptitude Test, and The Body Parts Test of Synthesis. The results of the investigation revealed that the control group demonstrated superior performance on all three tests of phonemic synthesis. It was also interesting to note the low correlations between the scores on the various tests. Implications of the results are discussed. (Author)

ABSTRACT 32290

EC 03 2290 ED N.A.
Publ. Date May 71 7p.
Hatten, John T.; Hatten, Pequetti A.
A Foster Home Approach to Speech Therapy.
EDRS not available
Journal of Speech and Hearing Disorders; V36 N2 P257-63 May 1971

Descriptors: exceptional child research; language handicapped; retarded speech development; speech therapy; operan conditioning; behavior change; learning disabilities

The paper describes a language development program for a 6-year-old child. The program consisted of foster home placement in a home where both parents were speech clinicians, and the program of instruction included an operant approach in the home and a 3-hour therapy session each day at a university speech and hearing clinic. During the first week of the child's stay, he initiated 55 verbalizations with a total of five separate words. By the end of the sixth week he was attempting over 1,000 verbalizations a week and a total of 65 separate words were produced. (Author)

ABSTRACT 32291

EC 03 2291 ED N.A.
Publ. Date May 71 17p.
Ryan, Bruce P.
Operant Procedures Applied to Stuttering Therapy for Children.
EDRS not available
Journal of Speech and Hearing Disorders; V36 N2 P264-80 May 1971

Descriptors: exceptional child research; speech handicapped; stuttering; speech therapy; operant conditioning; behavior change

Described are operant stuttering therapy programs for five children ranging in age from 6 to 9 years. The programs included programed desensitization, delayed auditory feedback, and gradual increase in the length and complexity of the speech utterance. Reinforcing events ranged from social reward to points which could be exchanged for toys. The programs varied in length from 15 to 73.3 hours. They were all successful in helping the children to establish fluent speech. Special transfer and maintenance programs were necessary for some of the children. Followup measures indicated that the children had maintained their fluency. The value of viewing stuttering as operant behavior was demonstrated. (Author)

ABSTRACT 32469

EC 03 2469 ED N.A.
Publ. Date 71 5p.
Bryant, John E.
Parent-Child Relationships: Their Effect on Rehabilitation.
EDRS not available
Journal of Learning Disabilities; V4 N6 P325-9 Jun-Jul 1971

Descriptors: exceptional child research; speech handicapped; parent child relationship; parent attitudes; parent counseling; emotional adjustment

The paper explores the three parent-child relationships most frequently observed in a clinical setting in the author's practice with children who have congenital speech disorders: parents who accept their children and their disorders, parents who reject their children and their disorders, and parents who compensate for their reactions to their children and their disorders. Shown is how compensation, which manifests itself out of a combination of acceptance and rejection of the child and his problem, impedes habilitation and rehabilitation. Several recommendations are made concerning early counseling of parents of handicapped children. (Author/KW)

ABSTRACT 32491

EC 03 2491 ED N.A.
Publ. Date 71 12p.
Love, Laura Russ
Identification of Brief Pauses in the Fluent Speech of Stutterers and Nonstutterers.
EDRS not available
Journal of Speech and Hearing Research; V14 N2 P229-40 Jun 1971

Descriptors: exceptional child research; speech handicapped; stuttering; speech habits; speech evaluation

Research has indicated that the fluent speech of stutterers is different from normal speech. A previous experiment suggested that a part of the difference between the fluent speech of normals and stutterers is to be found in the num-

ber of brief pauses, but varying recording gain levels could have affected the measurements. The present paper reports an attempt to resolve the gain problem and to examine brief pauses in the speech waveform. Twenty-five normal subjects, and 25 fluent stutterers were employed as subjects. Taped samples of reading were processed, using a Computer of Average Transients as the basic unit. An analysis of variance showed decisively that in our method of processing the speech samples, gain had affected pause length but had done so in the same manner for both stutterers and nonstutterers. There was no interaction. Stutterers were found to have a significantly greater number of pauses 150 to 250 msec long. A simple counter, called a Speech-Pause Counter, was devised which was able to give results as reliable as those of the computer, using a single sample of speech from each subject. (Author)

ABSTRACT 32492

EC 03 2492 ED N.A.
Publ. Date Jun 71 8p.
Weiner, Paul S.
Stability and Validity of Two Measures of Intelligence Used with Children Whose Language Development Is Delayed.
EDRS not available
Journal of Speech and Hearing Research; V14 N2 P254-61 Jun 1971

Descriptors: exceptional child research; retarded speech development; intelligence tests; test evaluation; preschool evaluation; test validity; test reliability; Arthur Adaptation of the Leiter International Performance Scale; Peabody Picture Vocabulary Test

An assessment was made of reliability and validity of the Arthur Adaptation of the Leiter International Performance Scale (AALIPS) and the Peabody Picture Vocabulary Test (PPVT) when used with preschool, language delayed children. The tests were used to examine a group of such children on three occasions. Six months elapsed between the first two administrations and approximately 2 years, on the average, between the first and third. On the last occasion, the Wechsler Intelligence Scale for Children (WISC) was also administered. The AALIPS proved to be quite useful as a gauge of intelligence level for this population. Measurements on it were stable through time and also predictive of later functioning on the WISC, particularly on the nonverbal section of that test. Useful in the group study, the AALIPS was also helpful in individual cases if interpretations were limited to judgments of normal and subnormal functioning. The PPVT was equally stable as a measure of group functioning. However, it was much less successful in predicting later functioning on the verbal section of the WISC. It seems to be much more limited than the AALIPS as a measure of intellectual functioning of preschool, language delayed children. Its scope is seen as a restricted though possibly helpful one. (Author)

ABSTRACT 32495

EC 03 2495 ED N.A.
Publ. Date Jun 71 7p.
Leonard, Laurence B.; Webb, Clarence E.
An Automated Therapy Program for Articulatory Correction.
EDRS not available
Journal of Speech and Hearing Research; V14 N2 P338-44 Jun 1971

Descriptors: exceptional child research; speech handicapped; articulation (speech); speech therapy; teaching machines; positive reinforcement; feedback

An automated therapy program, which consisted of 10 half-hour sessions, was designed to establish appropriate production of seven speech sounds in isolation and in words. The apparatus employed utilized tape-recorded material for stimuli and immediate playback to the child of his own correct response, made possible by integrating a delayed feedback (4 sec) device into the system, for reinforcement. A highly significant improvement occurred between the initial and final testing of the eight children who participated in the study. It was also found that there was significant carry-over of correct productions of the sounds taught into words not practiced although performance on the actual practice words was significantly higher still. (Author)

ABSTRACT 32709

EC 03 2709 ED N.A.
Publ. Date Sum 71 3p.
Burr, Helen G.; Ervin, Jean C.
Clearinghouse: Programed and Traditional Procedures in the Auditory Discrimination Phase of Articulatory Rehabilitation.
EDRS not available
Exceptional Children; V37 N10 P752-4 Sum 1971

Descriptors: exceptional child research; speech handicapped; articulation (speech); auditory perception; programed instruction; speech therapy

Automated programing and traditional speech therapy procedures for teaching auditory discrimination of the /s/ phoneme were compared. The EFI Audio Notebook was used, with a 20-lesson program recorded on EFI multichannel magnetic tapes. Each lesson provided 156 half-minute randomized items, of which 78 were stimulus and 78 were repeat items, and lessons provided ascending levels of speech sound discrimination difficulty. Matched control and experimental groups, selected from 40 second through fourth grade students were administered three articulation and auditory discrimination tests before, after, and 1 month after training. The groups were evaluated on achievement in auditory discrimination of the /s/ phoneme, general auditory discrimination, articulation of the /s/ phoneme, and articulation of other phonemes. Findings showed both groups progressed in similar manner and made similar gains, improving not just in discrimination of the /s/ phoneme but in all four behaviors tested. Retention of achievement was also similar for both groups, indicating that automated and traditional procedures are equally effective in teaching discrimination of the /s/ phoneme. (KW)

ABSTRACT 32895

EC 03 2895 ED N.A.
Publ. Date Aug 71 20p.
Bloch, Ellin L.; Goodstein, Leonard D.
Functional Speech Disorders and Personality: A Decade of Research.
EDRS not available
Journal of Speech and Hearing Disorders; V36 N3 P295-314 Aug 1971

Descriptors: exceptional child research; speech handicapped; personality; research reviews (publications); personal adjustment; parent influence; research methodology

The paper summarizes and evaluates the research literature published between 1958 and 1968, relating measured personality and adjustment to the functional (nonorganic) speech problems of articulation, delayed speech, voice, and stuttering. For each of these disorders a review and evaluation of the research is presented on the personality and adjustment of children suffering from that disorder, their parents, and, where appropriate, adults with that disorder. Methodological and conceptual problems are discussed in the context of the studies. It is concluded that the literature reviewed has yielded few conclusive findings and few new perspectives regarding the role of personality variables in the four major functional speech disorders. The methodological and conceptual inadequacies of most studies have been striking, and steady research efforts have yielded no firm evidence that differentiates speech-defective persons and their parents from normal speakers and their parents in terms of general adjustment or broadly identifiable personality patterns. Recommended as profitable is concentration of future research on specific within-group variables, such as improvement in therapy, rather than to continue the present focus. (Author)

ABSTRACT 32900

EC 03 2900 ED N.A.
Publ. Date Aug 71 9p.
Skelly, Madge and Others
Dysphonias Associated with Spinal Bracing in Scoliosis.
EDRS not available
Journal of Speech and Hearing Disorders; V36 N3 P368-76 Aug 1971

Descriptors: exceptional child research; physically handicapped; voice disorders; speech handicapped; speech therapy; dysphonia; iatrogenic diseases; Milwaukee braces

Pediatric patients fitted with Milwaukee braces for correction of lateral scoliosis exhibited disproportionate incidence of dysphonia characterized by hyperrhinolalia, which consistently persisted when checked a year after removal of the braces. A vocal-rehabilitation program alleviated the problem in 90% of the treated population, against a 90% persistence in the nontreated control group.

Pre-brace referral to the speech clinic followed by a voice-hygiene program may prevent onset of this dysphonia, which appears to be significantly different from dysphonia with other etiologies. (Author)

ABSTRACT 40037

EC 04 0037 ED N.A.
Publ. Date Sep 71 6p.
Adams, Martin R.; Reis, Ronald
The Influence of the Onset of Phonation on the Frequency of Stuttering.
EDRS not available
Journal of Speech and Hearing Research; V14 N3 P639-44 Sep 1971

Descriptors: exceptional child research; speech handicapped; stuttering; phonetics; speech evaluation; speech skills

To test the hypothesis that the frequency with which vocalization must be initiated in a given speech segment and the frequency of attendant disfluency are positively related, two passages were constructed. One passage was composed entirely of voiced speech sounds (all-voiced passage); the other contained both voiceless and voiced sounds (combined passage). Thus, in reading the later material, subjects had to effect more off-on phonatory adjustments than in the all-voiced selection. Aside from this difference, the passages were closely matched along several other linguistic and phonetic parameters. Fourteen stutterers performed five massed oral readings of each passage. Statistical analyses all showed that there was significantly less stuttering and more rapid adaptation associated with the all-voiced material. (Author)

ABSTRACT 40038

EC 04 0038 ED N.A.
Publ. Date Sep 71 14p.
Shriberg, Lawrence D.
The Effect of Examiner Social Behavior on Children's Articulation Test Performance.
EDRS not available
Journal of Speech and Hearing Research; V14 N3 P659-72 Sep 1971

Descriptors: exceptional child research; speech handicapped; articulation (speech); speech therapists; interpersonal relationship; attitudes; test reliability

Forty-eight first and second grade children with /r/ or /s/ errors met with an articulation examiner once a week for three consecutive weeks. During each session, the investigator role-played social behaviors of a supportive examiner (S) or a nonsupportive examiner (N) (Relationship Segment) and then administered a Vocal Imitation Task and an Imitative Articulation Task (Testing Segment). Subjects were divided into four groups balanced by sex, error sound, grade, and therapy experience. The sequence of experimental conditions for each group was Group 1 (SSS); Group 2 (NNN); Group 3 (SNS); and Group 4 (NSN). Two questions were posed: Do supportive versus nonsupportive examiner social behaviors affect articulation performance? Do differences in examiner social behaviors affect children's test-retest reliability? No main or interaction effects for the type of examiner behaviors were obtained on either dependent variable. Comparison of the Pearson correlation coefficients for each group indicated that Group 1 obtained the highest temporal reliability, 0.92, while Groups 2, 3, and 4 obtained average coefficients of 0.67, 0.76, and 0.62, respectively. Clinical and theoretical implications of these data point to the value of using intensive designs for further study of interpersonal variables in the clinical process. (Author)

ABSTRACT 40107

EC 04 0107 ED N.A.
Publ. Date 71 8p.
Hagin, Rosa A.
Perspectives of Specific Language Disability: III. The Future--What Are Some Significant Trends?
EDRS not available
Bulletin of the Orton Society; V21 P45-52 1971
Paper Presented at the Annual Conference of the Orton Society (21st, Washington, D. C., November 13, 1970).

Descriptors: exceptional child research; learning disabilities; language handicapped; dyslexia; research reviews (publications); educational trends; language research

The paper points out future directions in the treatment of specific language disability, highlighting what appear to be significant trends. Some predictable developments are said to be continued discussions of whether there is such a thing as dyslexia, use of the panacea, and new technology. The major portion of the article is devoted to a discussion of five areas of research which seem to have some significance for the diagnosis, teaching, and understanding of children with specific language disability. Recent developments, areas of concentration, and trends are pointed out for the five following areas of research: linguistics, educational philosophy, research strategies, biological substrata of language, and prevention. (KW)

ABSTRACT 40243

EC 04 0243 ED N.A.
Publ. Date Nov 71 1p.
Rives, Susan; Dasovich, Mary O.
Clearinghouse: Incidence of Examiners Reporting a Child's Awareness of His Speech Patterns.
EDRS not available
Exceptional Children; V38 N3 P266 Nov 1971

Descriptors: exceptional child research; speech handicapped; speech evaluation; student attitudes; emotional adjustment; speech therapists

Final copies of evaluation reports by speech pathologists were reviewed to note any written report concerning a child's feelings about his speech. Selected at random were records of 90 children, ages 2-18, seen for speech and language evaluation. In only 32 reports was the child's response alluded to: in 11 of these instances children revealed their attitudes in informal conversation with the examiner, in 14 instances responses were gleaned through observation by the examiner, and in 7 reports the mother's comments during the interview were the source of the report of child response. A direct correlation was found between amount of academic training of clinician and percentage reporting child's awareness of speech problem. Seventy-one percent of the 7 examiners with doctoral degrees recorded child response, compared to 36% of the 66 examiners with masters degrees and 24% of the 17 examiners with bachelors degrees. (KW)

ABSTRACT 40381

EC 04 0381 ED N.A.
Publ. Date Nov 71 20p.
Mowrer, D. E.
Transfer of Training in Articulation Therapy.
EDRS not available
Journal of Speech and Hearing Disorders; V36 N4 P427-46 Nov 1971

Descriptors: exceptional child research; speech handicapped; transfer of training; articulation (speech); research reviews (publications); speech therapy

The pertinent research findings relating to the transfer of training in articulation therapy are reviewed. These are discussed as they relate to five stages of articulation therapy: discrimination training, sounds in isolation, transfer among words, sentences, and spontaneous conversational speech. Two instructional procedures being used to maximize transfer of training are described: management of speaking situations outside the clinical setting and use of carefully sequenced instructional programs which are self-contained, requiring little or no outside management. The author concludes that if more effective research strategies are employed, it may be possible to pinpoint those variables speech clinicians can manipulate to further enhance transfer of training. (Author)

ABSTRACT 40389

EC 04 0389 ED N.A.
Publ. Date Nov 71 7p.
McCroskey, Robert L.; Baird, Virginia Green
Parent Education in a Public School Program of Speech Therapy.
EDRS not available
Journal of Speech and Hearing Disorders; V36 N4 P499-505 Nov 1971

Descriptors: exceptional child research; speech handicapped; speech therapy; parent influence; parent education; articulation (speech); speech improvement

Forty second-grade children with functional articulatory speech problems who had normal hearing and intelligence were divided equally and randomly into experimental and control groups. Of those originally identified, 50% were still available for evaluation at the end of the school year. Recorded speech samples were obtained at the beginning and end of the experimental period; observers were trained and asked to judge the severity of the articulatory problem. The results suggested that where parents were randomly selected and caused to participate, there was no real effect upon

the progress shown during therapy. Comments on procedures for conducting studies in public schools are included. (Author)

ABSTRACT 40391

EC 04 0391 ED N.A.
Publ. Date Nov 71 7p.
Leonard, Lawrence B.
A Preliminary View of Information Theory and Articulatory Omissions.
EDRS not available
Journal of Speech and Hearing Disorders: V36 N4 P511-7 Nov 1971

Descriptors: exceptional child research; speech handicapped; information theory; speech therapy; articulation (speech); case studies

The paper presents a preliminary view of the clinical application of information theory. An analysis of a 6-year-o'd child demonstrating inconsistent omissions of /z/ revealed that the /z/ items the child uttered were associated with much information while the /z/ items the child omitted contributed little information. Rather than sequencing treatment from those tasks most easily performed by the child to more difficult tasks, this approach commenced by requiring the child to correctly utter sentences more difficult for a listener to comprehend, and proceeded to requiring him to correctly utter sentences much easier for the listener to comprehend. This approach was based on the assumption that it is the listeners in a child's environment who are, at least in part, responsible for the child's articulatory behavior. (Author)

ABSTRACT 40715

EC 04 0715 ED N.A.
Publ. Date Jan 72 6p.
Fudala, Janet Barker and Others
Utilization of Parents in a Speech Correction Program.
EDRS not available
Exceptional Children: V38 N5 P407-12 Jan 1972

Descriptors: exceptional child research; speech handicapped; parent role; speech therapy; parent influence; articulation (speech); speech improvement

To determine the value of parental observation of public school speech correction programs, parents of elementary school children with nonorganic articulatory disorders attended speech classes with their children and practiced with them at home. The 92 children, representing various socioeconomic levels and ethnic groups, were given an individual picture articulation test at the beginning and end of the study, and scores on the Arizona Articulation Proficiency Scale were computed. Subjects were randomly assigned to one of two groups: in Group 1, parents were not asked to attend their child's regular speech classes but did help their child on assignments sent home; in Group 2A, parents attended the speech therapy sessions once a month, while in Group 2B parents attended all weekly sessions. Children in Groups 1 and 2 received the same therapy and homework assignments. Sixteen classes were held for each group. The mean speech improvement for Group 1 was 3.22%; mean improvement was 10.98% for Group 2A and 10.93% for Group 2B. Differences in improvement between Groups 1 and 2 were significant at the .001 level. Parents, teachers, and principals expressed approval of parent participation speech classes. (KW)

ABSTRACT 40819

EC 04 0819 ED 057 539
Publ. Date Jun 71 52p.
Wepman, Joseph M.; Morency, Anne S.
School Achievement as Related to Speech and Perceptual Handicaps. Final Report.
Chicago University, Illinois
Office of Education (DHEW), Washington, D. C.
EDRS mf,hc
OEG-2-7-070461-4543
BR-70461

Descriptors: exceptional child research; perceptually handicapped; intermediate grades; academic achievement; perceptual development; learning disabilities; longitudinal studies; speech handicaps

A longitudinal study of 120 children through grades one to six was undertaken. The present study focused on the intermediate grades (four through six). The goals were to explore the relationships among perceptual processing ability development, articulatory accuracy, intellgience, and academic achievement. The assessment battery consisted of an original five-part perceptual test battery; the Bender Visuo-Motor Gestalt test, the Dual Modality Test of Articulation, and the Metropolitan Achievement Test. The major findings of the study were that: the perceptual tests showed a yearly change characteristic of developmental processes; perceptual process ability and articulation errors became asymptotic by the end of the third grade; thee was no discernible difference in articulation accuracy whether or not a child was exposed to speech therapy during the first three grades; there was a continuing effect upon school achievement of the level of perceptual processing ability at grade one; there was almost no discernible relationship between early articulation ability and school achievement at any grade level; and speech therapy did not enhance school achievement of those children who were exposed to it over those who were not. (Author)

ABSTRACT 40862

EC 04 0862 ED N.A.
Publ. Date Nov 71 8p.
Williams, Frederick and Others
Teachers' Evaluations of Children's Speech.
EDRS not available
Speech Teacher: V20 N4 P247-54 Nov 1971

Descriptors: exceptional child research; disadvantaged youth; ethnic groups; low income groups; Mexican Americans; rating scales; speech evaluation; teachers

Research indicated that teachers consistently evaluated children's speech along the lines of the two global dimensions of confidence-eagerness and ethnicity-nonstandardness. The bases for the two dimensions were the teachers' verbal descriptions of children's speech, which teachers witnessed in 36 videotapes averaging 7 minutes in length. The videotapes presented interviews with 45 fifth and sixth grade boys and a white woman identified as a teacher; the boys represented middle and low income families for Mexican-Americans, blacks, and whites. It was found that when the videotapes were presented to small groups of teachers and teacher candidates along with a questionnaire, the two-factor rating scale model of confidence-eagerness and ethnicity-nonstandardness reflected the basic dimensionality of the speech evaluation. It was then found that the two-factor model was equally applicable to each of the three ethnic groups. Concerning order and time of judgments, results indicated that the subjects tended not to rate exclusively on one dimension before the other and that the average time for marking a scale was 90.8 seconds of viewing. Results also suggested that the reliability of the dimensions was high. (CB)

ABSTRACT 40896

EC 04 0896 ED N.A.
Publ. Date Dec 71 11p.
Boysen, Allen E.
Object-Naming Latency in Stuttering and Nonstuttering Children.
EDRS not available
Journal of Speech and Hearing Research: V14 N4 P728-38 Dec 1971

Descriptors: exceptional child research; speech handicapped; stuttering; reactive behavior; verbal ability; time factors (learning)

Twenty nonstuttering and eight stuttering male children provided naming responses to 34 pictures of simple objects, selected to represent a range from highest to lowest frequency of occurrence in the English language. The time taken to name objects was found to be negatively correlated with the logarithm of the frequency of occurrence of the names in the language. No evidence was found to indicate that stuttering children have longer object-naming latencies than nonstuttering children. (Author)

ABSTRACT 40921

EC 04 0921 ED N.A.
Publ. Date Feb 72 8p.
Gottesman, Ruth L.
Auditory Discrimination Ability in Negro Dialect-Speaking Children.
EDRS not available
Journal of Learning Disabilities: V5 N2 P94-101 Feb 1972

Descriptors: exceptional child research; disadvantaged youth; Negro youth; nonstandard dialects; auditory perception; language research; speech habits

Three groups of 40 first grade boys (Negro dialect-speaking, Negro standard English-speaking, and white standard English-speaking) were given an auditory discrimination test. The test was composed of two kinds of word pairs: those pairs pronounced as homonyms in Negro

dialect but as contrasting words in standard English, and those pairs pronounced as contrasting words by all subjects. The word pairs were presented on tape by both Negro dialect and standard English speakers. The purpose of the study was to examine whether differences existed in auditory discrimination ability between the Negro dialect-speaking and the standard English-speaking boys. Results indicated that there were no significant group differences in auditory discrimination performance on those word pairs which could be commonly differentiated in the speech of all subjects. However, both groups of standard English-speaking children scored significantly higher than the group of Negro dialect-speaking children on those word pairs pronounced as homonyms in Negro dialect when they were presented contrastingly by standard English speakers. (Author)

ABSTRACT 41134

EC 04 1134 ED N.A.
Publ. Date Feb 72 11p.
Daly, Daniel A. and Others
Structuring Speech Therapy Contingencies with an Oral Apraxic Child.
EDRS not available
Journal of Speech and Hearing Disorders; V37 N1 P22-32 Feb 1972

Descriptors: exceptional child research; speech handicapped; speech therapy; equipment utilization; reinforcement; oral apraxia

The study suggests the therapeutic efficacy of combining learning principles and speech therapy procedures in the treatment of an oral apraxic child. The paradigm emphasizes the careful specification and consequation of the desired verbal responses. The Wisconsin General Test Apparatus, an apparatus previously employed in psychological research, was used to structure the treatment environment for maximally effective learning. The results of treatment over a 6-month period and of a subsequent follow up evaluation are discussed. Hypotheses are offered to account for the success of the treatment program. (Author)

ABSTRACT 41139

EC 04 1139 ED N.A.
Publ. Date Feb 72 14p.
Shaw, Candyce K.; Shrum, William F.
The Effects of Response-Contingent Reward on the Connected Speech of Children Who Stutter.
EDRS not available
Journal of Speech and Hearing Disorders; V37 N2 P75-88 Feb 1972

Descriptors: exceptional child research; speech handicapped; stuttering; speech therapy; operant conditioning; positive reinforcement; behavior change

Through the use of response-contingent reward of fluent verbal responses, the frequency of stuttering behaviors of three children decreased. The frequency of fluent verbal behaviors increased. The experimental material consisted of spontaneous connected speech, the rewards were selected by the subjects, and the three conditioning periods were preceded with verbal instructions about the response contingency. Followup information on the subjects revealed spontaneous carry-over of the fluent speech obtained during the experimental sessions. The effects of the experimental sessions were useful in planning appropriate subsequent therapy. (Author)

ABSTRACT 41446

EC 04 1446 ED N.A.
Publ. Date Mar 72 11p.
Prins, David; Lohr, Frances
Behavioral Dimensions of Stuttered Speech.
EDRS not available
Journal of Speech and Hearing Research; V15 N1 P61-71 Mar 1972

Descriptors: exceptional child research; speech handicapped; stuttering; speech evaluation; classification; speech habits; statistical data

Nineteen stutterers, ages 14-23 years, provided samples of speech and reading from which scores representing 46 visible-audible phenomena were correlated. An analysis of the correlations revealed 10 factors which accounted for 83% of the variance. Six of the factors identified dimensions of stuttering similar to those described in the literature, but not previously derived empirically: overall stuttering severity, type of audible disfluency, adaptation, unilateral deviations, tension, and stuttering differences between spontaneous speech and reading. Applications are suggested to two-factor learning theory and to the classification of stutterers. (Author)

ABSTRACT 41456

EC 04 1456 ED N.A.
Publ. Date Mar 1972 5p.
Silverman, Franklin H.; Williams, Dean E.
Prediction of Stuttering by School-Age Stutterers.
EDRS not available
Journal of Speech and Hearing Research; V15 N1 P189-93 Mar 1972

Descriptors: exceptional child research; speech handicapped; stuttering; prediction; expectation

Each of 84 stutterers, ranging in age from 8 to 16 years, indicated, before reading aloud each of 50 words, whether or not he expected to stutter when he said each word. The percent of stutterings predicted was determined for each of the 62 subjects who stuttered at least once. These stutterers varied considerably in their ability to predict their stuttering; the percentages of correct predictions ranged from 0 to 100. Approximately half failed to predict the majority of their stuttering. The older subjects were not significantly more accurate in their predictions than were the younger ones. Implications of the findings for the application of anticipatory-struggle hypotheses to the stuttering problems of children between the ages of 8 and 16 years are discussed. (Author)

ABSTRACT 41844

EC 04 1844 ED N.A.
Publ. Date May 72 11p.
Egolf, Donald B. and Others
The Use of Parent-Child Interaction Patterns in Therapy for Young Stutterers.
EDRS not available
Journal of Speech and Hearing Disorders; V37 N2 P222-32 May 1972

Descriptors: exceptional child research; speech handicapped; stuttering; speech therapy; parent child relationship; parent influence

Nine school-age stutterers were seen in an experimental therapy program. The basic feature of the program was that parent-child interaction patterns were used in the planning of therapy. Such behaviors by the parent as verbal aggression, silence, and interruptions were identified in the parent-child interaction. These events were hypothesized as maintaining factors of stuttering, and were manipulated during therapy. Results support the hypothesized relationship. Clinical and experimental implications are discussed. (Author)

ABSTRACT 41447

EC 04 1447 ED N.A.
Publ. Date Mar 72 9p.
Silverman, Ellen-Marie
Generality of Disfluency Data Collected from Preschoolers.
EDRS not available
Journal of Speech and Hearing Research; V15 N1 P84-92 Mar 1972

Descriptors: exceptional child research; speech handicapped; stuttering; speech evaluation; environmental influences; incidence; preschool children; interviews; speech habits

Tape-recorded speech samples were collected from 10 4-year-old boys, both in their preschool classroom and in a structured interview on each of 3 days spaced 1 week apart. The frequency and duration of disfluency were computed for each sample. While the distribution of disfluency types and duration (extent) of disfluency were comparable in the two situations, considerably more disfluency was observed in the structured interview. The magnitude of the systematic situational difference in disfluency frequency suggests that it is risky to assume that a sample of disfluency elicited in a structured interview is representative of the behavior in other, more natural situations. (Author)

ABSTRACT 41452

EC 04 1452 ED N.A.
Publ. Date Mar 72 7p.
Prins, David
Personality, Stuttering Severity, and Age.
EDRS not available
Journal of Speech and Hearing Research; V15 N1 P148-54 Mar 1972

Descriptors: exceptional child research; speech handicapped; stuttering; age differences; personality; speech skills; personality problems; emotional problems; social adjustment

Sixty-six male stutterers, ages 8 to 21 years, were given the Califronia Test of Personality and evaluated for stuttering

severity during oral reading and spontaneous speech. Twenty-three subjects with other communicative disorders served as a control group. Simple and multiple correlation coefficients were computed among scores of personality, speech, and age. There were no significant correlations to indicate a relationship between personality maladjustment and increased age or stuttering severity. In the experimental group an interesting disparity was found between Social Standards (60th percentile) and Social Skills (30th percentile). Contrary to usual assumptions, however, signs of maladjustment were more prevalent among subjects with disorders of speech other than stuttering. (Author)

ABSTRACT 41933

EC 04 1933 ED 062 736
Publ. Date 72 91p.
Exceptional Children Conference Papers: Problems of Auditory, Visual, and Speech Impairments.
Council for Exceptional Children, Arlington, Virginia
Bureau of Education for the Handicapped (DHEW/OE), Washington, D. C.

EDRS mf,hc
Papers Presented at the Annual International CEC Convention (50th, Washington, D. C., March 19-24, 1972).

Descriptors: exceptional child research; handicapped children; aurally handicapped; visually handicapped; language development; stuttering; nonstandard dialects; auditory perception; sequential learning; sensory integration; conference reports

The collection of eight conference papers on problems of auditory, visual, and speech handicaps begins with a review of what is known about deaf-blind children and early development. Following papers are devoted to spontaneous vocalization and babbling in aurally handicapped infants, psychological synergism (an approach to consideration of problems of the hearing handicapped retarded), prediction of recovery from stuttering, and print reading for visually impaired children. The final three papers report studies investigating auditory discrimination performance as a function of nonstandard dialect, visual sequential memory in good and poor readers, and auditory-visual integration. (KW)

ABSTRACT 41936

EC 04 1936 ED 062 739
Publ. Date 72 112p.
Exceptional Children Conference Papers: Learning and Language Disabilities.
Council for Exceptional Children, Arlington, Virginia
Bureau of Education for the Handicapped (DHEW/OE), Washington, D. C.

EDRS mf,hc
Papers Presented at the Annual International CEC Convention (50th, Washington, D. C., March 19-24, 1972).

Descriptors: exceptional child research; learning disabilities; language handicapped; conference reports; identification; inservice teacher education; teaching methods; spelling; program descriptions

The ten conference papers on learning and language disabilities begin with discussions of staff development procedures for teachers of language handicapped children, methods of instructional intervention for such children, and the comparative utility of the limited, intensive, and comprehensive methods of identification and evaluation of language handicapped students. Research reported concerns the elimination of isolate behavior of a girl in a learning disability class, the contributions of perceptual and conceptual skill training to ability to discriminate and reproduce geometric form, use of distributive practices to modify spelling performance, and the electroencephalogram as a predictor of intellective and academic performance. Additional papers discuss behavioral aspects of learning disabilities and recent developments in the education of learning disabled adolescents. (KW)

ABSTRACT 42398

EC 04 2398 ED N.A.
Publ. Date Jun 72 16p.
Menyuk, Paula; Looney, Patricia L.
A Problem of Language Disorder: Length Versus Structure.
EDRS not available
Journal of Speech and Hearing Research: V15 N2 P264-79 Jun 1972

Descriptors: exceptional child research; language handicapped; sentence structure; early childhood; learning disabilities

The effects of sentence length and structure on the accuracy of sentence repetition by 13 normal speaking and 13 language disordered children were compared. The sentences were from three to five words long and were primarily imperative, active declarative, negative, andquestion sentences. All types of three-word sentences were repeated accurately by a greater percentage of language disordered children than were four- and five-word sentences, but the percentages of children accurately repeating these four- and five-word sentences did not differ significantly. Imperative and active declarative sentences were repeated accurately by a greater percentage of language disordered children and with fewer errors than were negative and question sentences. Length and structure had no significant effect on the accuracy of sentence repetition by normal speaking children. Levels of repetition accuracy varied in the deviant speaking population, and this appears to have important implications for therapeutic programming. (Author)

ABSTRACT 42403

EC 04 2403 ED N.A.
Publ. Date Jun 72 7p.
Williams, Ann M.
A Comparative Analysis of the ITPA and PPVT Performance of Young Stutterers.
EDRS not available
Journal of Speech and Hearing Research: V15 N2 P323-29 Jun 1972

Descripors: exceptional child research; stuttering; test interpretation; speech tests; test validity; speech handicapped; early childhood; childhood; Illinois Test of Psycholinguistic Abilities; Peabody Picture Vocabulary Test

The Illinois Test of Psycholinguistic Abilities (ITPA) and Peabody Picture Vocabulary Test (PPVT) were administered to 28 stutterers who ranged in age from 5 years, 3 months, to 9 years, 6 months. ITPA results suggested a tendency toward relative weakness at the automatic level, with a specific deficit in auditory-ocal sequencing ability. Correlation of PPVT and ITPA scores suggested that the Peabody may not be a valid measure of receptive auditory comprehension. (Author)

ABSTRACT 42406

EC 04 2406 ED N.A.
Publ. Date Jun 72 8p.
Peins, Maryann
Evaluation of a Tape-Recorded Method of Stuttering Therapy: Improvement in a Speaking Task.
EDRS not availabe
Journal of Speech and Hearing Research: V15 N2 P364-71 Jun 1972

Descriptors: exceptional child research; stuttering; speech therapy; evaluation; speech improvement; speech handicapped

A stuttering therapy method using two-track tape recorders of the language learning type was evaluated. Thirty-six etutterers, ages 13 to 43, were randomly assigned to one of three conditions for 6 months: a standard therapy, tape-recorder therapy, and a waiting list without therapy. Using the Thematic Apperception Test speaking task, severity ratings were obtained on each subject prior to therapy and at 3-month intervals during the 6 months of therapy or waiting list. Both therapy groups showed significant speech improvement; the waiting list controls did not. Reasons for the therapeutic effects of the tape-recorder therapy method are discussed. (Author)

ABSTRACT 42407

EC 04 2407 ED N.A.
Publ. Date Jun 72 8p.
Marquardt, Thomas P.; Saxman, John H.
Language Comprehension and Auditory Discrimination in Articulation Deficient Kindergarten Children.
EDRS not available
Journal of Speech and Hearing Research: V15 N2 P382-9 Jun 1972

Descriptors: exceptional child research; articulation (speech); kindergarten children; language ability; auditory perception; learning disabilities; language handicapped; syntax

The study examined the relationship between language comprehension and auditory discrimination in 30 kindergarten children with numerous misarticulations and 30 similarly aged children with proficient articulation. The Carrow Audi-

tory Test for Language Comprehension and the Wepman Auditory Discrimination Test were the test instruments. Results showed deficit performances by the articulation error group on both tests. Error scores on each task were significantly correlated with the number of misarticulations in the articulation error group. In addition, language comprehension and auditory discrimination were significantly correlated within the articulation error group but not within the articulation proficient group. These findings support the argument that children with numerous misarticulations show syntax performance deficits for their age because of underdeveloped syntax knowledge. The interdependence of language levels during acquisition is stressed. (Author)

ABSTRACT 42408

EC 04 2408 ED N.A.
Publ. Date Jun 72 12p.
Menyuk, Paula
Relationships Among Components of the Grammar in Language Disorder.
EDRS not available
Journal of Speech and Hearing Research; V15 N2 P395-406 Jun 1972

Descriptors: exceptional child research; language handicapped; syntax; sentence structure; learning disabilities

The study examined the relationship between the accuracy of repetition of syntactic structures and phonological sequences by language disordered children, and examined the effect of meaning on the phonological sequence repetition accuracy of a group of language disordered and normal speaking children. There was a significant correlation between the percentage of errors made by the language disordered children in syntactic structure repetition and phonological sequence repetition if the sequences were in words, and there was a tendency in this direction if sequences were in nonsense syllables. The meaningfulness of the sequences affected degree of repetition accuracy for the language disordered children and tended to do the same for normal speaking children. In addition, the distinctive feature components of the segments in both words and nonsense syllables were better recalled than the segments themselves, and there was great similarity in the rank order of feature recall in each type of sequence. These findings lead to suggestions concerning the structure of the language to be presented to these children in therapeutic situations. (Author)

ABSTRACT 42644

EC 04 2644 ED N.A.
Publ. Date Aug 72 9p.
Davis, Naida; Leach, Edwin
Scaling Aphasics' Error Responses.
EDRS not available
Journal of Speech and Hearing Disorders; V37 N3 P305-13 Aug 1972

Descriptors: exceptional child research; aphasia; speech tests; test interpretation; testing problems; learning disabilities

An aphasic's error response may roughly approximate the desired response or it may closely approximate the desired response. Since the relationship between actual response and desired response may have diagnostic and therapeutic utility, the study analyzed the relationship using a similarity continuum of gross, syntactic, and phonological components. The results indicated that recording of error responses as incorrect omits potentially useful clinical information. (Author)

ABSTRACT 42645

EC 04 2645 ED N.A.
Publ. Date Aug 72 9p.
Riley, Glyndon D.
A Stuttering Severity Instrument for Children and Adults.
EDRS not available
Journal of Speech and Hearing Disorders; V37 N3 P314-22 Aug 1972

Descriptors: exceptional child research; stuttering; speech tests; standardized tests; test validity; speech handicapped; handicapped; test reliability

A new instrument for measuring stuttering severity has been standardized on 109 children and 28 adults. The instrument attempted to meet the criteria of simplicity, objectivity, sensitivity to fluency changes of clinical significance, reliability, validity, and usability with children and adults. The frequency, duration, and associated physical concomitants of prolongations or repetitions of short speech segments are described. Procedures have been devised for scoring so that a range of 0 to 45 is possible. The statistical reliability and validity appear to qualify the instrument for clinical and research uses. (Author)

ABSTRACT 42647

EC 04 2647 ED N.A.
Publ. Date Aug 72 18p.
Fletcher, Samuel G.
Contingencies for Bioelectronic Modification of Nasality.
EDRS not available
Journal of Speech and Hearing Disorders; V37 N3 P329-46 Aug 1972

Descriptors: exceptional child research; voice disorders; speech therapy; biology; electromechanical aids; speech handicapped; clinical diagnosis

The article cites traditional difficulties in assessing and modifying nasality and proposes bioelectronic instrumentation, TONAR II, designed to overcome the problems. Specific criteria are listed for detecting and modifying nasality, and instrumental applications to meet the criteria are presented. A series of substudies are then reported which highlight important factors in the clinical management of nasality. Recent extention of the instrumentation to measure and manage other voice disorders is also described. (Author)

ABSTRACT 42648

EC 04 2648 ED N.A.
Publ. Date Aug 72 26p.
Fried, Christopher
Behavior Therapy and Psychoanalysis in the Treatment of a Severe Chronic Stutterer.
EDRS not available
Journal of Speech and Hearing Disorders; V37 N3 P347-72 Aug 1972

Descriptors: exceptional child research; stuttering; psychotherapy; behavior change; speech therapy; speech handicapped; college students; cognitive ability; attitudes; behavior patterns

A college student with a lifelong speech blockage so severe that he could not be treated by psychotherapy based on dialogue was able, after 42 sessions of systematic desensitization, to speak fluently. As soon as his speech permitted, while therapy was still in progress, a diagnostic study was undertaken. The results suggested that cognitive activity, attitudes, and behavior directly related to the symptom were consistent with psychoanalytic hypotheses on the personality dynamics of stutterers. Yet although the symptom appeared to be an integral part of a widely ramified personality disturbance, it could be removed without any attempt being made to alter other aspects of personality function. The implications of these paradoxical findings are discussed, with emphasis on stuttering, but also as they relate to understanding and treating neurosis generally. (Author)

ABSTRACT 42651

EC 04 2651 ED N.A.
Publ. Date Aug 72 13p.
Lawson, Lucie I. and Others
Effects of Adenoidectomy on the Speech of Children with Potential Velopharyngeal Dysfunction.
EDRS not available
Journal of Speech and Hearing Disorders; V37 N3 P390-402 Aug 1972

Descriptors: exceptional child research; voice disorders; medical treatment; medical evaluation; speech handicapped; surgical treatment

Despite the absence of an overt or submucous cleft of the palate, certain children manifest persistent nasality after an adenoidectomy. Removal of the adenoid tissue has unmasked an underlying anatomic or physiologic deficit in the velopharyngeal mechanism. In an effort to identify the premonitory signs of potential difficulties, 40 children with suspected velopharyngeal dysfunction were studied prior to consideration of an adenoidectomy. Four evaluative techniques were used: clinical speech evaluation, cineflourography, cephalometrics, and coordination pattern recordings. Each method of assessment contributed information that can serve as an alert to the potential consequences of a total adenoidectomy. The findings suggest the importance of careful evaluations and caution when considering a total adenoidectomy for children in whom there may exist only marginal indications of a potential velopharyngeal dysfunction. Where necessary for preservation of a child's hearing, a lateral adenoidectomy, maintaining the midline adenoid pad, would seem indicated. (Author)

ABSTRACT 42890

EC 04 2890 ED 065 977
Publ. Date Mar 72 303p.
Asp, Carl W.
The Effectiveness of Low-Frequency Amplification and Filtered-Speech Testing for Preschool Deaf Children.
Tennessee University, Knoxville
Bureau of Education for the Handicapped (DHEW/OE), Washington, D. C.
EDRS mf,hc
OEG-0-9-522113-3339 (032)

Descriptors: exceptional child research; deaf; preschool children; auditory training; speech tests; aurally handicapped; auditory perception; auditory tests; statistical data

In order to study effectiveness of low-frequency amplification and filtered-speech testing for preschool deaf children, an experimental design permitting the teacher to speak simultaneously through two different amplifying systems, a low-frequency auditory training unit (Suvag I) and a conventional auditory training unit (Warren T-2), was used with 30 children. All teachers utilized the Verbo-tonal Method for habilitating the children, who were assigned to one of the two amplifying systems. Speech samples were tape-recorded at 4-month intervals, judged, and analyzed statistically. Significant improvement over testing times for both groups was found, although the Suvag group demonstrated a greater rate of improvement than the Warren group. The condition of visual and auditory clues with amplification was reported to be the best experimental condition for most children. Significant differences between the groups in terms of vocalization was found, with the Suvag group vocalizing more times per minute than the Warren group. Significant correlation was also reported between rating value and hearing level. Electrical and acoustic responses of the Suvag I unit indicated that the unit passed more low-frequency energy than the Warren unit. Reporting of related research concluded the interim report. (Author/CB)

ABSTRACT 42929

EC 04 2929 ED N.A.
Publ. Date Spr 72 16p.
Meichenbaum, Donald H.; Turk, Lorraine
Implications of Research on Disadvantaged Children and Cognitive-Training Programs for Educational Television; Ways of Improving Sesame Street.
EDRS not available
Journal of Special Education; V6 N1 P27-42 Spr 1972

Descriptors: exceptional child research; disadvantaged youth; cognitive development; language handicapped; economically disadvantaged; culturally disadvantaged; research reviews (publications); educational programs; educational television; Sesame Street

Selected research was reviewed on disadvantaged children and cognitive training programs for educational television with special focus on the television program Sesame Street, its content, format, and style in light of developmental research. A variety of research approaches suggested that disadvantaged children share a similar pattern of characteristics and profile of deficits. Evidence for a performance rather than a learning deficit in disadvantaged children was reported to come from investigators who indicated the situational specificity of the disadvantaged child's inadequate verbal and cognitive repertoires. An examination of the familial environment of disadvantaged children was said to help explain these well-documented deficits. Maternal teaching behavior was also reviewed. Evidence concerning the importance of the contribution of language growth to social class differences in intellectual performance was provided. The disadvantaged child was found to manifest motivational and attitudinal differences from more socially advantaged children. The most effective cognitive training programs were found to emphasize language and strategy development: self-initiated comprehension of tasks, spontaneous production of mediators, and use of such mediators to control nonverbal behaviors. It was suggested that the Sesame Street format minimally overcomes the deficiencies of language and rarely models ways to comprehend a task to spontaneously produce mediators and strategies, and to use such mediators to control nonverbal and interpersonal behaviors. Two additional criticisms leveled at Sesame Street were that the children watching the program learn in a passive, effortless fashion in contrast to children who learn through active mental and physical manipulation of learning materials. Also, the program was thought to ignore noncognitive aspects of behavior.

ABSTRACT 42970

EC 04 2970 ED 066 855
Publ. Date Jul 72 208p.
Gordon, Don E.
Survey of Speech Articulation Disorders Among Military Dependent Children.
Fitchburg State College, Massachusetts
National Center for Educational Research and Development (DHEW/OE), Washington, D. C.
EDRS mf,hc
OEG-1-71-0020 (509)

Descriptors: exceptional child research; speech handicapped; military personnel; articulation (speech); fathers; national surveys; incidence

Reported was a study involving 20,000 (army) military dependent children (MDC) attending 75 schools in seven school systems throughout the continental United States during 1971. Testing of 412 randomly selected MDC using the Goldman-Fristoe Test of Articulation revealed a significant correlation and associative factor between MDC speech articulation disorders and the number of combat tours of duty spent by the soldier-father in Vietnam. No significant correlations were reported between comparisons of speech articulation disorders to geographical separation of the soldier-father from his family unit, number of houses in which the child lived, military grade or rank of the father, father's age, familial placement of the child, or the father's military occupational specialty. The types of speech articulation disorders recorded among tested MDC approximated those reported in the literature for the general school age population. The incidence rate among MDC was higher than the norm in grades 1 through 4, but lower than the norm in grades 5 and 6. In two of the three schools in which MDC attended with civilian dependent children (CDC), the speech articulation disorder incidence rate among MDC was about three times greater than that for CDC in grades 2 through 4, but lower in grades 5 and 6. (Author)

ABSTRACT 50257

EC 05 0257 ED N.A.
Publ. Date Sep 72 11p.
Sommers, Ronald K. and Others
Articulatory Effectiveness, Stimulability, and Children's Performances on Perceptual and Memory Tasks.
EDRS not available
Journal of Speech and Hearing Research; V15 N3 P579-89 Sep 1972

Descriptors: exceptional child research; speech handicapped; articulation (speech); auditory perception; task performance; early childhood; perception; memory

Articulatory effectiveness and speech sound stimulability were studied in the performances of 70 children (35 kindergarten children and 35 first graders) on four auditory measures and one oral sensory discrimination task. Each group of 35 children included seven subjects with superior articulation, seven with deviant articulation and poor speech sound stimulability, seven with deviant articulation and good stimulability, seven with articulation defects and poor stimulability, and seven with articulation defects and good stimulability. Performances on a speech sound stimulability task were not found to be related to performances on any of the auditory measures and to be only slightly related to the oral sensory task. Superior articulators had significantly better scores than the deviant and defectives on the oral sensory discrimination task, but scores on the auditory tasks were not significantly different. Comparison of the performances of subjects predominantly defective in articulating r and s revealed the latter group to be inferior on some auditory tasks compared with the superior articulators. (Author)

ABSTRACT 50258

EC 05 0258 ED N.A.
Publ. Date Sep 72 7p.
Cooper, Eugene B.
Recovery from Stuttering in a Junior and Senior High School Population.
EDRS not available
Journal of Speech and Hearing Research; V15 N3 P632-38 Sep 1972

Descriptors: exceptional child research;

stuttering; secondary school students; speech therapy; success factors; speech handicapped

Recovery from stuttering was studied in 187 junior and senior high school students of whom 119 were active stutterers and 68 reported recovery from stuttering. The one-third recovery rate for the total population, while contrasting with a four-fifths recovery rate reported in a college student study varied from less than one-third in the junior high group to approximately one-half in the high school population. Familial incidence of stuttering was negatively related to recovery from stuttering. A positive relationship was found between parental identification of stuttering and the stutterer's receiving speech therapy. No relationships were observed among recovery and stuttering severity, participation in therapy, and the nature of initial disfluencies. (Author)

ABSTRACT 50405

EC 05 0405 ED 070 232
Publ. Date Jun 72 80p.
Webster, Ronald L.
An Operant Response Shaping Program for the Establishment of Fluency in Stutterers. Final Report.
Hollins College, Va.
Bureau of Education for the Handicapped (DHEW/OE), Washington, D. C.
EDRS mf,hc
OEG-0-70-2718(607)

Descriptors: exceptional child research; stuttering; speech therapy; behavior change; reinforcement; speech handicapped; program descriptions; computer programs; rating scales; word frequency; followup studies; operant conditioning

Reported was a 3 week fluency shaping program in which 56 stutterers (aged 8 to 59 years) were each assisted by a single speech therapist through the following program stages: very slow speech; vowels; consonant initiated syllables; one, two, and three syllable words; short, self generated sentences; spontaneous speech; and transfer. Ss also worked with a computer system which monitored speech sound characteristics and provided feedback on the accuracy of responses. Each S was described in terms of sex, age, previous treatment indication, and stuttering frequency prior to program participation. Reported were significant pre- and post-treatment differences in Ss on measures of disfluent word frequencies. A newly derived objective index of stuttering severity was said to correlate significantly with global ratings of severity made by a speech pathologist. Post-treatment measures on the Perceptions of Stuttering Inventory made on the average of 4 months after the program were found to be significantly lower than the pre-treatment measures. Followup data collected 2 years after the program showed that significant gains in speech fluency had been retained for seven out of 10 Ss. (Author/GW)

ABSTRACT 50463

EC 05 0463 ED 071 227
Publ. Date 72 9p.
Telser, Elsa B.; Rutherford, David R.
Clinical Assessment of Word-Finding Abilities of Stuttering and Nonstuttering Children.
EDRS mf,hc
Reprint From Proceedings, 80th Annual Convention, American Psychological Association, Honolulu, Hawaii, September 1972

Descriptors: exceptional child research; stuttering; word recognition; speech skills; verbal ability; speech handicapped; childhood; verbal tests

The word finding skills of a group of 20 stuttering children (5 to 12 years of age) were compared with those of a control group of 20 normally speaking children matched for age and socioeconomic status. The Northwestern Word Latency Test was administered in which each child was shown 46 pictures of common objects. Any picture not named readily on the initial presentation was eliminated from subsequent administrations of the test for that child. Four additional administrations of the remaining pictures in the series were carried out. Fifty-five percent of the Ss were found to have easily demonstrable word finding problems. Older children in both the stuttering and nonstuttering groups named pictures faster than the younger, but the older stutterers were only as fast as the younger nonstutterers. Moreover, young and old stutterers without word finding difficulties did not differ in mean response time from young nonstutterers. (GW)

ABSTRACT 50501

EC 05 0501 ED 070 234
Publ. Date 30 Jun 71 74p.
Shames, George H.; Egolf, Donald B.
Experimental Therapy for School-Age Children and Their Parents. Final Report.
Pittsburgh University, Pa.
Office of Education (DHEW), Washington, D. C. Bureau of Research
EDRS mf,hc
OEG-0-8-080080-3525

Descriptors: exceptional child research; stuttering; speech therapy; parent child relationship; parent role; speech handicapped; childhood; adolescents; classification; verbal communication; program development; education programs

Reported were the development and testing of a therapy program for stutterers which aimed at involving parents in the treatment process. The experimental therapy program was developed and applied to a group of 13 parent child dyads whose interaction patterns were analyzed in an attempt to identify factors pertinent to the child's stuttering. Therapeutic strategies were developed on the basis of observed parent maintenance of stuttering behaviors. Children were found to generalize their increased fluency, acquired with a therapist, to their respective parents. Positive changes in parental verbal behavior were observed. The feasibility of employing the therapy program in a school setting was tested with 13 children. The program was found to be successful in managing stuttering and feasible from the viewpoint of school administrators. Categorization of parent child interactions into 35 thematic content categories was thought to provide crucial information relating to possible maintenance factors of stuttering. It was found that parents of stutterers consistently yielded more negative profiles on the basis of the categories than did parents of nonstutterers. (Author/GW)

ABSTRACT 50735

EC 05 0735 ED N.A.
Publ. Date 72 44p.
Menyuk, Paula
The Development of Speech.
EDRS not available
Bobbs-Merrill Company, Inc., College Division, 4300 West 62nd Street, Indianapolis, Indiana 46268 ($1.25).

Descriptors: exceptional child research; speech handicapped; infancy; early childhood; speech skills; speech improvement; language development; language learning levels; language handicaps; speech handicaps; speech pathology; psycholinguistics

Discussed is research on speech-sound acquisition in infancy and early childhood, and included are the speech learning task, the normal course of speech development, and the implications of research on deviant speech behavior. What the child has to learn is seen to include three components: segmental features such as differing initial sounds, rules for the combinations of segmental features such as lengthening the vowel when a final strident is voiced, and supra-segmental features such as the intonation difference between a sentence and a question. The following conclusions are derived from observation of the normal course of speech development: the infant does not produce phonated sounds at birth, the same sequence of development is observed in all children, and the use of all basic syntactic structures occurs before the correct articulation of all speech sounds. Deviant phonological acquisition is discussed and one finding reported is that children who use markedly deviant syntactic rules also use markedly deviant phonological rules. For a related document see EC 050 734. (DB)

ABSTRACT 50748

EC 05 0748 ED N.A.
Publ. Date Nov 72 20p.
Leonard, Laurence B.
What Is Deviant Language?
EDRS not available
Journal of Speech and Hearing Disorders; V37 N4 P427-46 Nov 1972

Descriptors: exceptional child research; speech handicapped; language patterns; transformation theory (language); language research; literature reviews; sentence structure; linguistics; identification; morphology (languages); clinical diagnosis

Presented were an explanation of deviant language in terms of the transformational

model, a review of literature on deviant language use, and data comparing the use of syntactic and morphological structures by nine normal and nine deviant language users. Normal and deviant language users (mean chronological age, 5 years and 3 months) were found to differ significantly in the frequency of their use of 14 tested structures. Criteria for identifying clinically relevant language differences and for distinguishing different from delayed language were proposed. It was suggested that analysis of children's two word utterances for the frequency of subject-verb utterances may be a means of early identification of deviant language users. Limitations in the clinical application of transformational grammar were examined. (GW)

ABSTRACT 50750

EC 05 0750 ED N.A.
Publ. Date Nov 72 11p.
Pollack, Evelyn; Rees, Norma S.
Disorders of Articulation: Some Clinical Applications of Distinctive Feature Theory.
EDRS not available
Journal of Speech and Hearing Disorders; V37 N4 P451-61 Nov 1972

Descriptors: exceptional child research; speech handicapped; articulation (speech); clinical diagnosis; speech evaluation; early childhood; speech therapy; case studies; phonetics

Explained were clinical advantages said to result from application of distinctive feature theory to the analysis of the speech of children with defective articulation. Distinctive feature analyses were made of the articulation test data of a child with a phonemic disorder who received speech therapy at three intervals, when he was 5 years 2 months old, 5 years 8 months old, and 6 years 3 months old. Each analysis was compared both with the adult model to reveal the rules of the child's phonological competence at that time, and with preceding analyses to show the changes in the child's rule system as his speech gradually approached the adult model. Distinctive feature analysis was found to be most useful in describing speech patterns of children whose misarticulations were clear substitutions or omissions of sound segments. (GW)

AUTHOR INDEX

Adams, Martin R 40037.
Asp, Carl W 42690.
Baird, Virginia Green 40389.
Bell, Dorothy Mays 23575.
Berndt, Lois A 30857.
Black, John W 31177.
Bloch, Ellin L 32895.
Boone, Daniel R 30585.
Boysen, Allen E 40896.
Bryant, John E 32469.
Burr, Helen G 32709.
Compton, Arthur J 31198.
Cooper, Eugene B 50258.
Crandell, Edwin W 22438.
Daly, Daniel A and Others 41134.
Darley, Frederic L 30411.
Dasovich, Mary O 40243.
Davis, Naida 42644.
Dixon, Sarah D 32275.
Egolf, Donald B 50501.
Egolf, Donald B and Others 41844.
Erickson, Robert 10808.
Ervin, Jean C 32709.
Fletcher, Samuel G 42647.
Flowers, Arthur 21278, 22438.
Frick, James W 10502.
Fried, Christopher 42648.
Fudala, Janet Barker and Others 40715.
Gallagher, Betty 31054.
Garrett, Edgar Ray 10492, 10637.
Gerstman, Hubert L 11640.
Girardeau, Frederic L, Ed 23442.
Goldman, Ronald 11253, 32275.
Goodglass, Harold and Others 30413.
Goodstein, Leonard D 32895.
Gordon, Don E 42970.
Gottesman, Ruth L 40921.
Gregory, Hugo H 30104.
Gross, F P 10022.
Hagin, Rosa A 40107.
Harrison, Robert J 21768.
Hatten, John T 32290.
Hatten, Pequetti A 32290.
Holland, Audrey L 31205.
Holloway, Gordon F 31967.
Jacobs, Rhoda J and Others 31201.
Jensen, Paul J 10469.
Johns, Donnell F 30411.
Koplin, James H, Ed 31235.
Lawson, Lucie I and Others 42651.
Leach, Edwin 42644.
Leonard, Laurence B 32495, 40391, 50748.
Lohr, Frances 41446.
Looney, Patricia L 42398.
Love, Laura Russ 32491.
Love, Russel J 21493.
MacLearie, Elizabeth G 10022.
Mahaffey, Robert B 21487.
Marquardt, Thomas P 42407.
Marshall, Robert C 23613.
Martin, Richard 30857.
McCroskey, Robert L 40389.
McFarland, Robert L 10246.
McLean, James E 30032.
Meichenbaum, Donald H 42929.
Menyuk, Paula 42398, 42408, 50735.
Morency, Anne S 22293, 40819.
Morrison, Eleanor B and Others 30418.
Mowrer, D E 40381.
Needham, Ellen C 31177.
Peins, Maryann 42406.
Pendergast, Kathleen and Others 20964.
Pleasonton, Anna K 30416.
Pollack, Evelyn 50750.
Prins, David 41446, 41452.
Rees, Mary Jane 10318.
Rees, Norma S 50750.
Reiff, Donald G 21677.
Reis, Ronald 40037.
Riley, Glyndon D 42645.
Rives, Susan 40243.
Rosenberg, Sheldon, Ed 31235.
Rutherford, David R 50463.
Ryan, Bruce P 32291.
Sanders, Edwina 23575.
Sarno, Martha Taylor and Others 30414.
Saxman, John H 42407.
Shames, George H 50501.
Shames, George H and Others 11538.
Shaw, Candyce K 41139.
Shriberg, Lawrence D 40038.
Shrum, William F 41139.
Siegenthaler, Bruce M 11640.
Silverman, Ellen-Marie 41447.
Silverman, Franklin H 31202, 41456.
Skelly, Madge and Others 32900.
Sommers, Ronald K and Others 50257.
Speaks, Charles and Others 31180.
Spradlin, Joseph E, Ed 23442.
Stech, Ernest L 30585.
Telser, Elsa B 50463.
Tikofsky, Ronald S 21677.
Turk, Lorraine 42929.
Van Demark, D R 31179.
Van Riper, Charles 10808, 12071.
Webb, Clarence E 32495.
Weber, Jack L 23338.
Webster, Ronald L 10638, 50405.
Weiner, Paul S 32492.
Wepman, Joseph M 10246, 21251, 22293, 40819.
Williams, Ann M 42403.
Williams, Dean E 41456.
Williams, Frederick 30404.
Williams, Frederick and Others 40862.

SUBJECT INDEX

ASCS 10637.
Academic Achievement 22293, 22438, 40819.
Adolescents 50501.
Adults 30104, 30411, 30414.
Age Differences 21493, 41452.
Anxiety 30104.
Aphasia 10637, 21677, 30411, 30413-30414, 31177, 31205, 31235, 42644.
Arthur Adaptation of the Leiter International Performance Scale 32492.
Articulation (Speech) 10022, 10318, 10492, 10637, 10808, 11253, 12071, 20964, 21251, 21493, 21768, 22293, 23338, 23442, 23575, 23613, 30032, 30411, 30416, 31179, 31198, 31201, 32275, 32495, 32709, 40038, 40381, 40389, 40391, 40715, 42407, 42970, 50257, 50750.
Attitudes 40038, 42648.
Audiolingual Methods 10638.
Audiometric Tests 31180.
Audiovisual Aids 30032, 30414.
Audiovisual Instruction 30585.
Audition (Physiology) 21487.
Auditory Discrimination 10492, 10637-10638, 11253, 22293, 23338.
Auditory Evaluation 22438.
Auditory Perception 21278, 21487, 22438, 23575, 30413, 31177, 31180, 31967, 32709, 40921, 41933, 42407, 42890, 50257.
Auditory Tests 10318, 11253, 22438, 42890.
Auditory Training 10492, 10638, 11253, 11640, 42890.
Aural Stimuli 10637-10638, 21278, 21493, 31177.
Aurally Handicapped 10318, 11640, 23442, 30585, 31180, 31235, 41933, 42890.
Automated Stimulus Control System 10637.
Automation 10637.
Behavior Change 23442, 30857, 32290-32291, 41139, 42648, 50405.
Behavior Patterns 30418, 42648.
Biology 42647.
Case Studies 31205, 40391, 50750.
Case Studies (Education) 21768.
Cerebral Palsy 21493.
Certification 10318.
Child Development 21251.
Classification 41446, 50501.
Cleft Palate 11538, 21251, 21768, 31179, 31201.
Clinical Diagnosis 42647, 50748, 50750.
Cognitive Ability 42648.
Cognitive Development 42929.
College Students 10502, 42648.
Comparative Analysis 21278.
Computer Programs 50405.
Conditioned Stimulus 23613.
Conference Reports 31235, 41933, 41936.
Consonants 31201.
Contrastive Linguistics 21677.
Culturally Disadvantaged 42929.

Deaf 42890.
Delayed Auditory Feedback 10638.
Disadvantaged Youth 30404, 40862, 40921, 42929.
Dyslexia 40107.
Dysphonia 32900.
Early Childhood 10469, 10492, 42398, 42403, 50257, 50463, 50501, 50735, 50750.
Ears 21487.
Economically Disadvantaged 42929.
Educational Experiments 21251.
Educational Programs 42929, 50501.
Educational Television 42929.
Educational Trends 40107.
Electromechanical Aids 10246, 42647.
Electronic Equipment 30416.
Elementary School Students 10808, 12071, 21278, 22293, 23575.
Emotional Adjustment 32469, 40243.
Emotional Problems 41452.
English 21677.
Environmental Influences 41447.
Equipment Utilization 41134.
Ethnic Groups 40862.
Etiology 21251.
Evaluation 30411, 42406.
Evaluation Criteria 30404.
Exceptional Child Research 10022, 10246, 10318, 10469, 10492, 10502, 10637-10638, 10808, 11253, 11538, 11640, 12071, 20964, 21251, 21278, 21487, 21493, 21677, 21768, 22293, 22438, 23338, 23442, 23575, 23613, 30032, 30104, 30404, 30411, 30413-30414, 30416, 30418, 30585, 30857, 31054, 31177, 31179-31180, 31198, 31201-31202, 31205, 31235, 31967, 32275, 32290-32291, 32469, 32491-32492, 32495, 32709, 32895, 32900, 40037-40038, 40107, 40243, 40381, 40389, 40391, 40715, 40819, 40862, 40896, 40921, 41134, 41139, 41446-41447, 41452, 41456, 41844, 41933, 41936, 42398, 42403, 42406-42408, 42644-42645, 42647-42648, 42651, 42890, 42929, 42970, 50257-50258, 50405, 50463, 50501, 50735, 50748, 50750.
Expectation 41456.
Experimental Programs 10022.
Family Relationship 11538.
Fathers 42970.
Feedback 10638, 21487, 32495.
Film Production 30032.
Followup Studies 50405.
Grammar 21677, 30413.
Group Therapy 31205.
Grouping (Instructional Purposes) 23575.
Handicapped 42645.
Handicapped Children 41933.
Iatrogenic Diseases 32900.
Identification 10808, 12071, 41936, 50748.
Illinois Test of Psycholinguistic Abilities 42403.
Imitation 31201.
Incidence 41447, 42970.
Infancy 50735.
Infant Behavior 30418.
Information Theory 40391.
Initial Teaching Alphabet 11253.
Inservice Teacher Education 41936.
Instructional Aids 10246.
Instructional Films 30032.
Instructional Materials 11253.
Intelligence Quotient 21493.
Intelligence Tests 32492.
Intermediate Grades 40819.
Interpersonal Relationship 40038.
Interviews 41447.
Kindergarten Children 20964, 42407.
Language Ability 21677, 42407.
Language Development 21768, 41933, 50735.
Language Fluency 10246, 10638.
Language Handicapped 10637, 21677, 22438, 31177, 32290, 40107, 41936, 42398, 42407-42408, 42929.
Language Handicaps 31235, 50735.
Language Learning Levels 50735.
Language Patterns 30404, 50748.
Language Research 22293, 31235, 40107, 40921, 50748.
Language Skills 30414.
Language Tests 30414.
Learning Difficulties 21251.
Learning Disabilities 10637, 31967, 32290, 40107, 40819, 41936, 42398, 42407-42408, 42644.
Learning Processes 21251.
Linguistic Patterns 23338.
Linguistics 50748.
Listening Comprehension 11538, 30411, 30413.
Literature Reviews 50748.
Longitudinal Studies 22438, 40819.
Low Income Groups 40862.
Males 10502.
Measurement Techniques 30411.
Medical Evaluation 42651.
Medical Treatment 42651.
Memory 50257.
Mental Development 21251.
Mentally Handicapped 10637, 21251, 31235.
Mexican Americans 40862.
Military Personnel 42970.
Milwaukee Braces 32900.
Minimally Brain Injured 23442.
Morphology (Languages) 50748.
Mothers 11538.
Motivation 11640.
Multisensory Learning 11253.
National Surveys 42970.
Negative Attitudes 31054.
Negative Reinforcement 10469, 23613, 30857.
Negro Dialects 30404.
Negro Youth 40921.
Neurologically Handicapped 30418.
Nonstandard Dialects 40921, 41933.
Operant Conditioning 23442, 32290-32291, 41139, 50405.
Oral Apraxia 41134.
Oral Communications 21251.
PSTA 10808.
Parent Attitudes 32469.
Parent Child Relationship 32469, 41844, 50501.
Parent Counseling 32469.
Parent Education 40389.
Parent Influence 32895, 40389, 40715, 41844.
Parent Participation 11253, 21768.
Parent Role 40715, 50501.
Parkinson's Disease 30418.
Peabody Picture Vocabulary Test 32492, 42403.
Peer Acceptance 31054.
Perception 21278, 31967, 50257.
Perceptual Development 40819.
Perceptual Motor Coordination 31967.
Perceptually Handicapped 21278, 40819.
Performance Factors 20964.
Personal Adjustment 32895.
Personality 21487, 32895, 41452.
Personality Problems 41452.
Phonemes 10808, 30411, 31198.
Phonemics 11253.
Phonetic Analysis 11253.
Phonetic Transcription 23338.
Phonetics 11253, 31198, 32275, 40037, 50750.
Phonics 22438.
Phonologic Units 23338.
Phonology 31198.
Phonotape Recordings 30585.
Physically Handicapped 21251, 32900.
Positive Reinforcement 10469, 32495, 41139.
Prediction 20964, 41456.
Predictive Measurement 12071.
Predictive Screening Test of Articulation 10808.
Preschool Children 11253, 41447, 42890.
Preschool Evaluation 32492.
Preschool Programs 21768.
Primary Grades 10808, 20964.
Professional Education 30032, 30585.
Professional Training 10318.
Program Descriptions 41936, 50405.
Program Development 10022, 50501.
Program Evaluation 10022, 21768.
Program Improvement 10022.
Programed Instruction 10492, 10637, 30414, 31205, 32709.
Programed Materials 31205.
Progressive Relaxation 30104.
Psycholinguistics 31235, 31967, 50735.
Psychological Patterns 30104.
Psychomotor Skills 10502, 30418.
Psychotherapy 42648.
Public Schools 10318.
Racial Discrimination 30404.
Rating Scales 11538, 12071, 40862, 50405.
Reactive Behavior 40896.
Reading Achievement 22293, 22438.
Reinforcement 10469, 10637, 23442, 30857, 41134, 50405.
Research and Development Centers 10318.
Research Methodology 32895.
Research Needs 10318.
Research Problems 10318.
Research Reviews (Publications) 11253, 32895, 40107, 40381, 42929.
Retarded Speech Development 21251, 31967, 32290, 32492.
Scheduling 10022.
Schematic Studies 10637.
Schizophrenia 31235.
Screening Tests 10808.
Second Language Learning 31235.
Secondary School Students 50258.
Self Concept 31202.
Self Evaluation 31202.
Sensory Experience 30416.
Sensory Integration 21487, 31177, 41933.
Sensory Training 21493.
Sentence Structure 21677, 42398, 42408, 50748.
Sequential Learning 41933.
Sesame Street 42929.
Sex Differences 21493.
Social Adjustment 41452.
Social Status 30404.
Socioeconomic Background 22438.
Speech 21487.
Speech Evaluation 12071, 20964, 21768, 30104, 31179-31180, 31198, 32491, 40037, 40243, 40862, 41446-41447, 50750.
Speech Habits 10246, 31198, 32491, 40921, 41446-41447.

Speech Handicapped 10022, 10246, 10318, 10469, 10492, 10502, 10638, 10808, 11253, 11538, 11640, 12071, 20964, 21251, 21278, 21493, 21768, 22293, 22438, 23338, 23442, 23575, 23613, 30032, 30104, 30404, 30411, 30413-0414, 30416, 30418, 30585, 30857, 31054, 31177, 31179, 31198, 31201-31202, 31205, 32275, 32291, 32469, 32491, 32495, 32709, 32895, 32900, 40037-40038, 40243, 40381, 40389, 40391, 40715, 40896, 41134, 41139, 41446-41447, 41452, 41456, 41844, 42403, 42406, 42645, 42647-42648, 42651, 42970, 50257-50258, 50405, 50463, 50501, 50735, 50748, 50750.
Speech Handicaps 10022, 10318, 10469, 10502, 10638, 21278, 30819, 50735.
Speech Improvement 10022, 10246, 10492, 10502, 10638, 11253, 12071, 20964, 21493, 21768, 22293, 40389, 40715, 42406, 50735.
Speech Pathology 23442, 50735.
Speech Skills 10638, 11538, 20964, 22293, 31202, 32275, 40037, 41452, 50463, 50735.
Speech Tests 10318, 10808, 12071, 20964, 21251, 21493, 22293, 30418, 42403, 42644-42645, 42890.
Speech Therapists 10318, 21768, 30585, 40038, 40243.
Speech Therapy 10022, 10246, 10318, 10492, 10502, 10637-10638, 10808, 11253, 11640, 20964, 21493, 21768, 22293, 23338, 23442, 23575, 23613, 30032, 30104, 30414, 30585, 31198, 31201, 31205, 32290-32291, 32495, 32709, 32900, 40381, 40389, 40391, 40715, 41134, 41139, 41844, 42406, 42647-42648, 50258, 50405, 50501, 50750.
Spelling 41936.
Standardized Tests 42645.
Statistical Data 41446, 42890.
Stimulus Behavior 10637.
Stimulus Devices 21278.
Student Attitudes 40243.
Student Reaction 21278.
Student Testing 10808.
Stuttering 10246, 10318, 10469, 10502, 10638, 30104, 30857, 31202, 32291, 32491, 40037, 40896, 41139, 41446-41447, 41452, 41456, 41844, 41933, 42403, 42406, 42645, 42648, 50258, 50405, 50463, 50501.
Success Factors 50258.
Surgical Treatment 42651.
Syntax 30413, 42407-42408.
Tactual Perception 30416.
Task Performance 50257.
Teacher Attitudes 30404, 31054.
Teachers 40862.
Teaching Machines 10492, 10637, 32495.
Teaching Methods 41936.
Television 23442.
Templin Darley Articulation Test 10492, 10637.
Test Construction 12071.
Test Interpretation 42403, 42644.
Test Reliability 11538, 32492, 40038, 42645.
Test Validity 10808, 12071, 32492, 42403, 42645.
Testing Problems 42644.
Tests 10808.
Theories 10638.
Time Factors (Learning) 40896.
Time Perspective 21487, 31177.
Training 21493.
Transfer of Training 40381.
Transformation Theory (Language) 50748.
Verbal Ability 40896, 50463.
Verbal Communication 11538, 50501.
Verbal Learning 21251.
Verbal Stimuli 10469, 11538, 21493.
Verbal Tests 50463.
Video Tape Recordings 30585.
Visual Discrimination 11253.
Visual Perception 21278, 31967.
Visual Stimuli 11253, 21278, 21493.
Visually Handicapped 41933.
Vocabulary Skills 30413.
Voice Disorders 10637, 32900, 42647, 42651.
Word Frequency 50405.
Word Recognition 50463.
Young Adults 10502.

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